



**Decision Record
And
Finding of No Significant Impact**

**Environmental Assessment
CA-360-EA-2004-23**



**Swasey Drive Area Implementation Plan
Shasta County, California**



**U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
REDDING FIELD OFFICE
355 Hemsted Dr.
Redding, CA 96002**

2004

Frontispiece: View of central portion of Swasey planning area looking northerly across parcel



United States Department of the Interior

Bureau of Land Management

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September, 2004



IN REPLY REFER TO:

1610 (P)

(CA-360-31)

Dear Reader:

Enclosed is the activity plan, Decision Record and Finding of No Significant Impact for the Redding Bureau of Land Management (BLM) Swasey Drive Planning Area. Rules are explained for public use, enjoyment and protection of public lands and associated cultural and natural resources, including the Swasey Drive Area of Critical Environmental Concern (ACEC).

Public participation in forming the plan included comments on the scope of the planning and issue identification. More comments and questions were offered to BLM at a public meeting held at the Redding Field Office on November 19, 2003. Finally, there was a 30-day public comment period from November 3, 2003 to December 8, 2003 to address the draft management plan and environmental assessment for public lands in the Swasey Drive Planning Area. Comments were provided both during this final review time period and afterwards and all are considered.

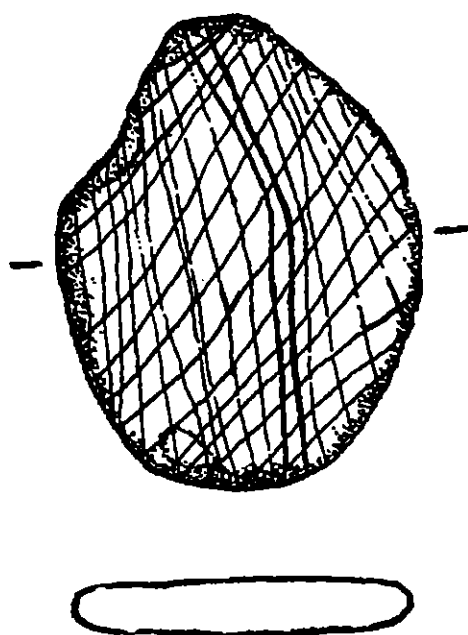
A copy of this activity plan may be obtained from the Redding BLM Field Office, 355 Hemsted Dr., Redding, CA, 96002; telephone 530-224-2100, or by requesting it through the website at www.ca.blm.gov/redding. All parties currently on the distribution list for this planning action are being mailed copies.

A news release will announce the availability of this document and starts a 30-day appeal period in accordance with planning regulation 43 CFR Part 4.

For additional information, please call Dr. Eric Ritter, BLM Archaeologist, at 530-224-2131

Sincerely,

Steven W. Anderson
Field Manager



Incised Stone, Middle Mule Pond

SWASEY DRIVE IMPLEMENTATION PLAN

Finding of No Significant Impact (FONSI)/Decision Record

SUMMARY

The Swasey Drive public lands include an Area of Critical Environmental Concern with historic and prehistoric cultural locations to be managed and interpreted. Other public uses of the area will be provided consistent with maintaining natural resources and recreation opportunities. Use of the Swasey target shooting area will be phased out over a 4-year period with limitations to shotguns and special permitted uses.

DECISION

The October 2003 management Alternative 1, (Resource Protection Emphasis and Qualified Recreation Uses) is approved. Significant points of the decision include:

- Hunting with firearms is allowed in perpetuity subject to conformance with California hunting regulations.
- Target shooting is restricted to the use of shotguns within the existing target shooting area. This level of shooting will be phased out over a **four year period**. During the phase-out period the only exception to target shooting with shotguns is under an approved special recreation permit as issued only for certain situations by the Redding Field Office.
- The area is closed to **motor vehicle** access from sunset to sunrise beyond the main trail head parking area near Swasey Drive.
- Tourism will be promoted for interpretation and appreciation of the cultural history of the area.
- Vehicle routes will receive increased maintenance and erosion control.
- Camping is by BLM Special Recreation Use Permit only.
- Public lands within the planning area will be retained.

ALTERNATIVES CONSIDERED

Four management alternatives have been analyzed including the No Action-Continuation of Existing Management alternative. In all cases there will be: Archaeological site protection and interpretation; law enforcement patrol and assistance; protection of water/soil quality; a consideration of public health and safety; protection of wildlife habitat and fisheries; semi-primitive recreation; environmental education; well-controlled commercial mining if applications are received; continuation of existing utility/transportation rights-of-ways; facility and road maintenance and signing; fire protection/prevention and vegetation manipulation; limitation of trespass on private lands; and select removal of noxious weeds and plants.

Alternative 1, the Proposed Action (Resource Protection Emphasis and Qualified Recreation Uses) includes a nighttime closure to motorized vehicle use; construction of various fences and gates; parking lot construction; and retention of public lands (portions of sections 6 and 7) scheduled for disposal in the Resource Management Plan (RMP). Only shotguns are approved

for casual shooting (non-hunting) use at the existing target shooting area. The shooting area will be closed from sunset to sunrise. The existing target shooting area will be closed four years from the date that this plan is approved. Existing designated vehicle routes will be maintained. Soil erosion will be stabilized at select locations. This alternative also calls for heritage resources' tourism promotion (on-the-ground public-oriented interpretation of cultural resources); hunting throughout the area; all other firearm use restricted to the existing target shooting area; and select bee hive placement.

Alternative 2, the Public Recreation Alternative, will keep open currently designated routes for motorized travel. Barriers and fences will be constructed where needed to limit soil erosion or other resource damage. The target shooting area will be further developed through trenching, target alignments, and range adoption by private interests, etc. with a nighttime closure. Public lands scheduled for disposal will be retained - BLM will seek acquisition of the private in-holding at fair-market value; a primitive group campground near Swasey Drive will be established; hunting will remain open with non-hunting related shooting away from the designated target shooting area prohibited; and select bee hive placement will be allowed.

Alternative 3, the Mixed Public Use and Resource Protection Alternative, will close the area to motorized entry except by special permit. Gates, fences and a parking lot will be constructed. The existing target shooting area will be open for group shoots or organized events only with further development of the shooting area. There will be a nighttime closure to shooting and vehicular use; a primitive group campground may be established; hunting is allowed and non hunting recreation shooting away from the designated target shooting area is prohibited. Select bee hive placement will be allowed.

No Action-Continuation of Existing Management Alternative will include a broad spectrum of non-motorized recreation activities including persistence of use of the existing target shooting area; open camping; hunting allowed subject to California Department of Fish and Game regulations; open to vehicle use on designated routes 24 hours per day; open to mining; disposal of certain Public Lands; continuation of use of designated routes for motorized vehicle travel; fire protection and vegetation management; noxious weed removal; law enforcement; environmental education; public interpretation of resources; case by case resource protection actions such as installation and maintenance of fencing, barricades and gates; area open to permitted realty actions such as rights-of-ways; case by case permitted recreation and scientific use (i.e., mountain bike races, scientific archaeological excavations, etc.).

MANAGEMENT CONSIDERATIONS (RATIONALE)

Public safety to neighbors of the Swasey Drive property is the primary consideration for restrictions to continued use of the target shooting area. Safety of hikers and other users of the area has also been evaluated. Motor vehicle access is restricted to daylight hours because of unauthorized partying, mud-bogging and soil damage away from routes, and illegal trash disposal.

In the Environmental Analysis, under existing conditions cultural resources will continue to be managed on a makeshift basis with at least one site per year expected to be damaged. Firearms use from the existing target shooting area will continue to pose safety concerns. Fire and fuel

management practices are anticipated to prevent approximately one incident every 5-10 years (which is the case in all alternatives). Off-road motorized vehicle disturbances to the ground will continue at a rate of about one surface acre per year of soil disturbance. Disposal of select lands could lead through construction activities and intensified land use to watershed and habitat damage and other intrusions on cultural and natural resources. If the one private in-holding is not acquired (as proposed in all alternatives except the No Action-Continuation of Existing Management Alternative) there could be increased management costs due to the close proximity of public resources and future developments (such as housing) on the private parcel. Developed land uses will generate noise and create features that will diminish to an unknown degree the experience of public land visitors especially those wishing to appreciate the local cultural sites and natural resources. It could as well lead to increased management costs such as from delineation and fencing of boundaries, rights-of-way work, monitoring for illegal intrusions such as from motorized vehicles, etc.

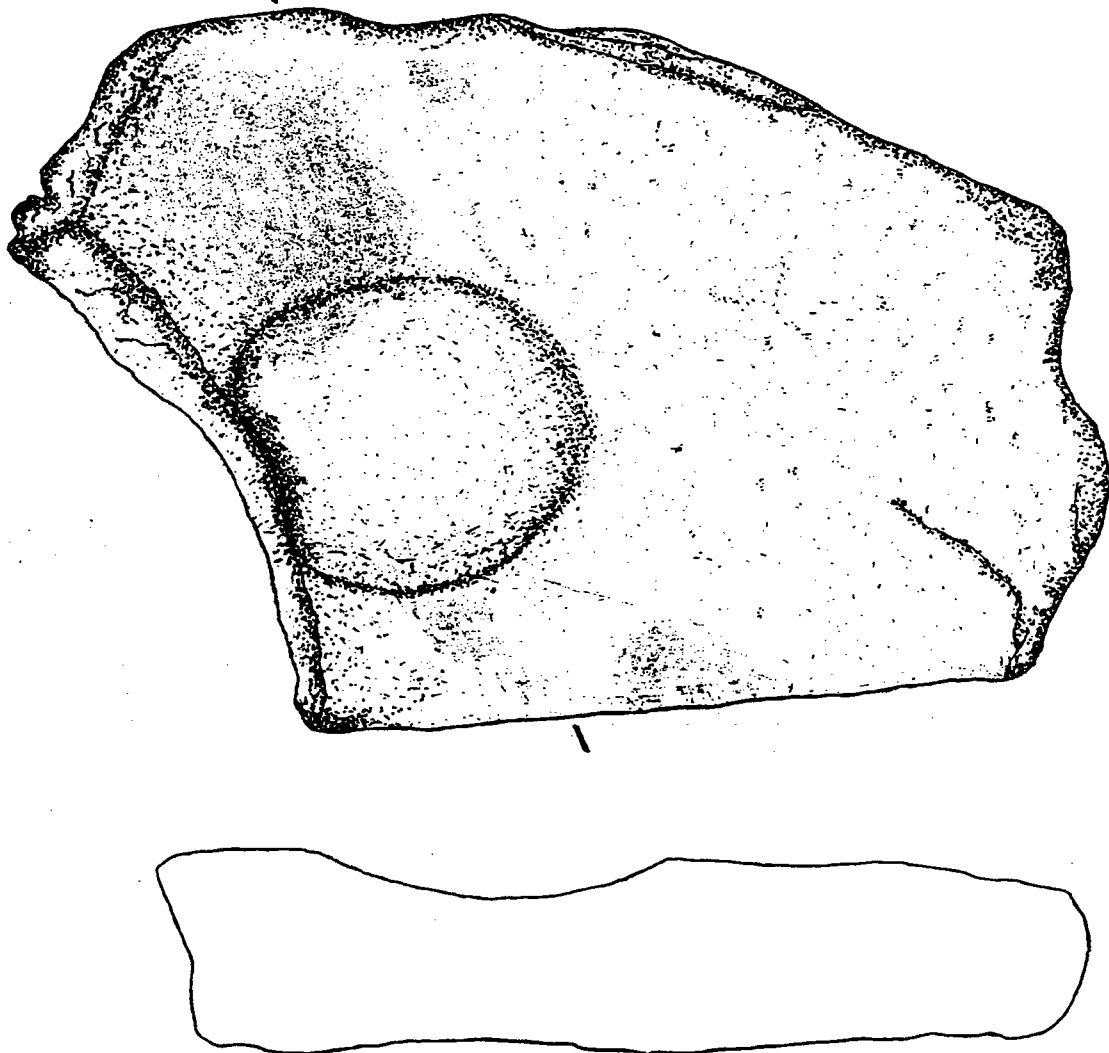
PUBLIC INVOLVEMENT

An internal interdisciplinary planning team was established in late 2000 to begin the Swasey Implementation Plan. Previous ad-hoc meetings of public and private individuals during the early 1990s had been held to deal with the issues of firearm use and safety brought to the table. Internal BLM planning sessions began in January 2001. The public, tribes and various government offices were notified of this land use planning endeavor in May of 2001. They were invited to participate by identifying planning issues. These included individuals on the local BLM mailing list, neighbors, and numerous groups and agencies that were thought to potentially have an interest. The scoping document for the Swasey Area Implementation Plan and Environmental Analysis Record announcement was posted on BLM's web site and a request for input was posted at the Redding BLM office front counter. Notices of the planning effort and issue identification process and study area map were posted on the BLM kiosk at the main entrance to the Swasey Drive planning area. Public responses generally support the multiple use concept and the issues raised by BLM staff. Responses were made both for and against use of the target shooting area, and shooting in general. This also is true regarding motorized vehicle use in the area, and about boundary adjustments. Public access and safety is clearly an issue, as is the need for increased law enforcement. Wildfire control considerations were strongly expressed and a general concern was conveyed that controlled burns not occur. Among the many topics raised in the letters was an advocacy for more non motorized recreation/nature trails, including those for mobility impaired individuals; interpretation; erosion control and habitat/watershed improvement; upgraded signing; and consideration of trespass problems. Support was almost unanimous for cultural resource protection.

APPEAL RIGHTS

This decision may be appealed to the Interior Board of Land Appeals, Office of the Secretary, in accordance with the regulations contained in Title 43 Code of Federal Regulations (CFR) Part 4. If an appeal is taken, your notice of appeal must be filed within 30 days from receipt of this decision at the Redding Field Office, Bureau of Land Management, U.S. Department of the Interior, 355 Hemsted Dr., Redding, California 96002. The appellant has the burden of showing that the decision appealed from is in error.

If you wish to file a petition [pursuant to 43 CFR 4.21 (58 FR 4939, January 19, 1993)] for a stay of the effectiveness of this decision during the time that your appeal is being reviewed by the Board, the petition for a stay must accompany your notice of appeal. A petition for a stay is required to show sufficient justification based on the following standards: (1) The relative harm to the parties if the stay is granted or denied; (2) The likelihood of the appellant's success on the merits; (3) The likelihood of immediate and irreparable harm if the stay is not granted, and (4) Whether the public interest favors granting the stay. Copies of the notice of appeal and petition for a stay must also be submitted to each party named in this decision and to the Interior Board of Land Appeals and to the appropriate Office of the Solicitor (see 43 CFR 4.413) at the same time the original documents are filed with this office. If you request a stay, you have the burden of proof to demonstrate that a stay should be granted.



Hopper Mortar—Middle Mule Pond Site

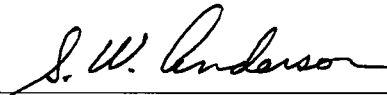
FINDING OF NO SIGNIFICANT IMPACT
Environmental Assessment
CA-360-EA-2004-23

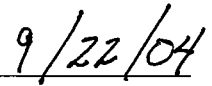
**Swasey Drive Planning Area (Area of Critical Environmental Concern and Adjoining
Public Lands) Activity Plan and Environmental Assessment**

Environmental effects associated with the proposed action and the alternatives have been assessed. Based upon the analysis provided in the attached EA, CA-360-2004-23, I conclude the approved action is not a major federal action and will result in no significant impacts to the environment under the criteria in Title 40 Code of Federal Regulations 1508.18 and 1508.27. Preparation of an Environmental Impact Statement to further analyze possible impacts is not required pursuant to Section 102(2) (c) of the National Environmental Policy Act of 1969.

RATIONALE: Based on the analysis documented in the aforementioned EA which has been reviewed by an interdisciplinary team, I conclude that the approved action as stipulated will not result in any unnecessary or undue degradation of the Federal lands. The approved action is in conformance with the Redding Resource Management Plan.

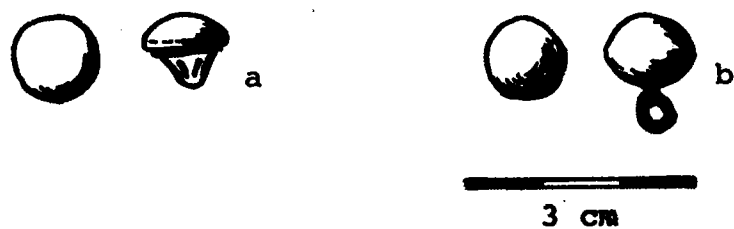
DECISION APPROVED BY:





Field Manager
USDI Bureau of Land Management
Redding Field Office
355 Hemsted Dr.
Redding, CA 96002

Date



Ceramic Button and Brass Button from CA-SHA-1544/H (Chinese component)

Swasey Drive Activity Plan

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Swasey Drive Area Implementation Plan

EXECUTIVE SUMMARY

The primary management goal for the Swasey Drive planning area is protection of both historic and prehistoric cultural resources. There is little public disagreement with plans to protect the existing resources through fencing and control of vehicle access about the property. Coupled with resource protection will be continued access and a variety of public uses of this urban-fringe land.

The need to protect public safety both on and off the Swasey Drive public lands will require eventual closing of the existing shooting area to the discharge of firearms. Closing the shooting area will extend over a 4-year period. During that time shotguns will be the only allowed firearms except for special permitted gun uses (hunter's safety courses, law enforcement instruction and concealed weapons training). In this latter case use of rifles and handguns will be allowed by Special Recreation Permits granted at the Redding BLM Field Office. Other rules are discussed later in this document for the proposed plan.

The Bureau of Land Management (BLM) has developed an activity level strategy or management plan for the Swasey Planning Area which includes both the Swasey Area of Critical Environmental Concern (ACEC) and surrounding lands totaling 1,250 acres. This area is situated within the west Redding foothills encompassing the upper Olney Creek watershed of Shasta County, California. This planning effort is a consequence of BLM's 1993 Resource Management Plan (RMP) for the lands administered by the Redding Field Office.

Since the planning area heart is a cultural resource-related ACEC, the plan seeks to ensure that remnants of prehistoric and historic use are preserved, studied and interpreted. The plan considers a variety of human uses and enjoyment of the public lands within the Swasey Drive Planning Area. The plan also decides between competing human uses, provides for non-motorized recreation, protects wildlife and fisheries habitat and watershed stability, seeks to safeguard users and neighbors alike from errant gunfire, and addresses wildland-urban interface fire hazards.

Preliminary scoping of **planning issues** for the area, both those from staff members and those solicited by mail from agencies and the public revealed the following as most significant: **cultural resources, firearm use, human health and safety, motorized vehicle use, and accelerated soil erosion.**

A number of general management activities common to all proposed alternatives have been proposed. These include archaeological site protection and interpretation; law enforcement patrol and assistance; protection of water and soil quality; public health and safety; protection of wildlife and fisheries habitat; semi-primitive recreation use (including existing and developed trail systems and permitted camping only); environmental education; mining of locatable minerals; existing utility/transportation rights-of-way; protection-information facility maintenance/signing and visitor information; prevention of private land trespass; fire

protection/prevention and vegetation manipulation; removal of noxious weeds and plants; trash removal/cleanup; road and trail maintenance; administration; and land tenure decisions.

Four management alternatives have been proposed including the **No Action-Continuation of Existing Management alternative**.

Alternative 1, the proposed action (Resource Protection Emphasis and Qualified Recreation Uses) includes a nighttime closure to motor vehicle use beyond the main parking area; 15 miles per hour vehicle speed limit; construction of various fences and gates; parking lot construction; retention of public lands (portions of sections 6 and 7) scheduled for disposal in the RMP; closure of the existing gun range at night and complete closure after four years following plan approval with a limitation to shotgun and special permitted use only during these four years; continued use of designated routes for vehicular travel; erosion stabilization at select locations; heritage tourism promotion; hunting throughout the area; and select bee hive placement.

Under **Alternative 2, the Public Recreation Alternative**, currently designated routes for motorized travel will remain; construction of barriers and fences will selectively occur; the gun range will be further developed through trenching, target alignments, range adoption by private interests, etc. with a nighttime closure; the public lands scheduled for disposal will be retained--BLM will seek acquisition of the private in-holding at fair-market value; a primitive group campground near Swasey Drive will be established; hunting will remain open with non-hunting related shooting away from the gun range prohibited; and select bee hive placement will be allowed.

Under **Alternative 3, the Mixed Public Use and Resource Protection Alternative**, the area will be closed to motorized entry except by special permit; gates, fences and a parking lot will be constructed; the existing gun range will be open for group shoots or organized events only with further development of the range; there will be a nighttime closure to shooting and vehicular use; a primitive group campground may be established; hunting is allowed and non hunting recreation shooting away from the shooting area is prohibited. Select bee hive placement will be acceptable.

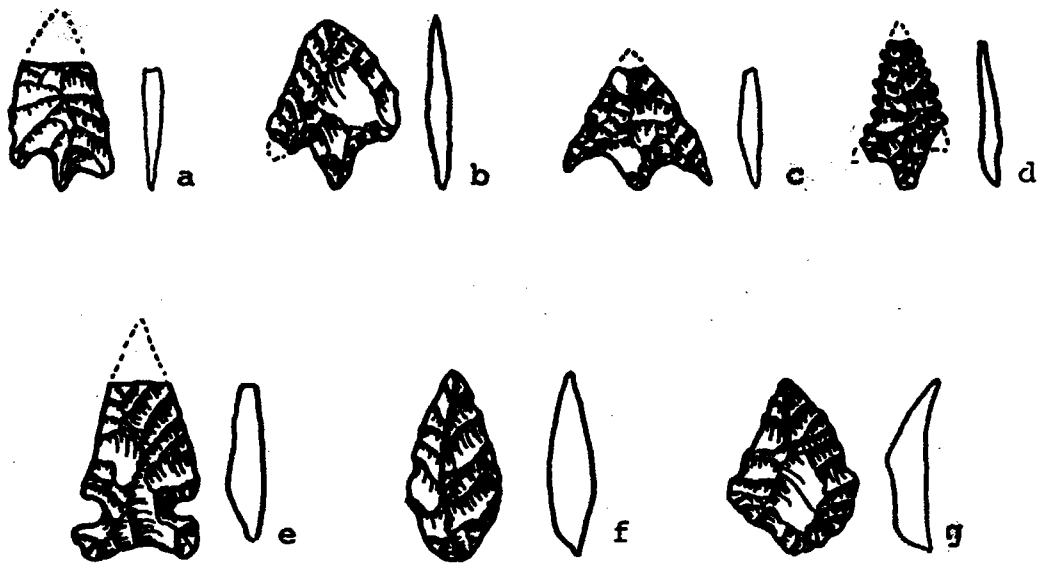
In the Environmental Analysis, under **No Action-Continuation of Existing Management** cultural resources will continue to be managed on a makeshift basis with at least one site per year or two expected to be damaged. Firearms use will continue to pose safety and noise nuisance concerns. Fire and fuel management practices are expected to prevent approximately one incident per 5-10 years (which is the case in all alternatives). Off-road motorized vehicle disturbances to the ground will continue at a rate of about one surface acre per year of soil disturbance. Disposal of select lands could lead through construction activities and intensified land use to watershed and habitat damage and other intrusions on cultural and natural resources. Retention of select lands will maintain a broader recreation land base. If the one private in-holding is not acquired (as proposed in all alternatives except existing conditions) there could be increased management costs due to the close proximity of public resources and developments on the private parcel. Such proximity to a newly established built environment might lead to increased auditory and visual increases and unwanted disturbance to visitors wishing to appreciate the local cultural sites and natural resources. It could as well lead to increased management costs such as from delineation and fencing of boundaries, rights-of-way work, monitoring for illegal intrusions such as from off-road vehicles, etc.

Under **Alternative 1**, effects on cultural resources will be lowered to less than one incident per year coupled with increased public interpretation and education opportunities. Firearm use will be phased out with fewer dangerous incidents but hundreds to thousands fewer visitor days devoted to this activity each year. Motorized vehicle use will be slowed and curtailed. Hence there will be fewer (scores to hundreds) recreation days devoted to this activity but also a decrease in soil and habitat damage and visual and auditory intrusions to other recreationists along with an increase in vehicular safety due to restrictions on speed. There will be a decrease of 10 or less cubic meters of sedimentation per year. Retention of public lands will curtail archery club expansion but will allow more efficient management of the larger area with a broad spectrum of recreation opportunities and less illegal intrusions such as from off-highway motorized vehicles and dumping of trash. Non-motorized recreation trail use will increase by hundreds of visitors per year.

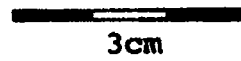
Increased visitor use of the area under **Alternative 2** could lead to inadvertent damage to archaeological sites (one or more incidents per year). Development of a formal gun range will increase this recreation opportunity by hundreds of visitor days per year. However, safety and liability issues will rise and illegal shooting away from the range could prove hazardous to nearby homeowners, trail users and other recreationists. Motorized vehicle use will continue to lead to sediment loss at a rate probably not exceeding 10 cubic yards per year. Construction of a primitive campground will provide more use of this type by hundreds of visitor days. On the other hand, it likely would increase management costs by hundreds to thousands of dollars per year.

Alternative 3 will enhance archaeological site protection to some sites by limiting visitor use. Other sites in remote locations may be damaged due to relative seclusion (where an individual could hide while looting a site). Firearm use will remain a safety issue from the possibility of errant bullets from the range area. Off-road motorized vehicle play will be reduced by 50% from current conditions. This will lead to a decrease in soil erosion (prevention of 5-10 cubic yards of soil/sediment loss per year). There will be an increase of perhaps hundreds of non-motorized trail use visits per year.

Appeal rights to this decision can be found at the beginning of this document.



Middle Mule Pond Site Projectile Points



CHAPTER 1--INTRODUCTION

The Swasey Planning Area, which includes the Swasey Drive Area of Critical Environmental Concern (ACEC) and adjoining public lands, is a 1,250-acre (about 2 square miles) unit or parcel on Swasey Drive, located just west of Redding, California. The ACEC portion was designated in the Redding Resource Management Plan (RMP) completed by the Bureau of Land Management (BLM) in 1993. The purpose of the designation is to conserve and interpret prehistoric and historic archaeological resources on public lands. Land use allocations for the larger planning area based on the 1993 RMP are to manage it as a Semi-Primitive Motorized recreation area with vehicles limited to designated roads and trails (RMP pp. 44-45). This current implementation or activity plan and environmental assessment by BLM describes the future uses and management for the Swasey Drive Planning Area.

This Planning Area is in the western valley foothills of Shasta County (Figure 1) bounded on the east by Swasey Drive and on the west by the Mule Mountain ridge and Whiskeytown-Shasta-Trinity National Recreation Area. The south boundary is along the Middletown Estates residential development. The north boundary coincides partially with the National Recreation Area boundary and relatively undeveloped foothills. This semi-rural area is located in the northwest end of California's Sacramento Valley within Township 31 N., Range 5 W., portions of sections 6 and 7, and Township 31 N., Range 6 W., all of Section 12, and part of Section 11 (Figure 1). The location is west of the Redding city limits, within the upper basin of Olney Creek, a secondary drainage of the Sacramento River. Redding itself is a growing urban center with considerable human use influences on this study area.

This plan is valuable to the public by protecting and enhancing historic and prehistoric cultural resources. The plan will specify the management actions that will safeguard the ecosystem and watershed, allow compatible public uses of the resources, foster public safety, and observe private property rights.

A. PURPOSE AND NEED FOR THE PLAN AND ENVIRONMENTAL ASSESSMENT

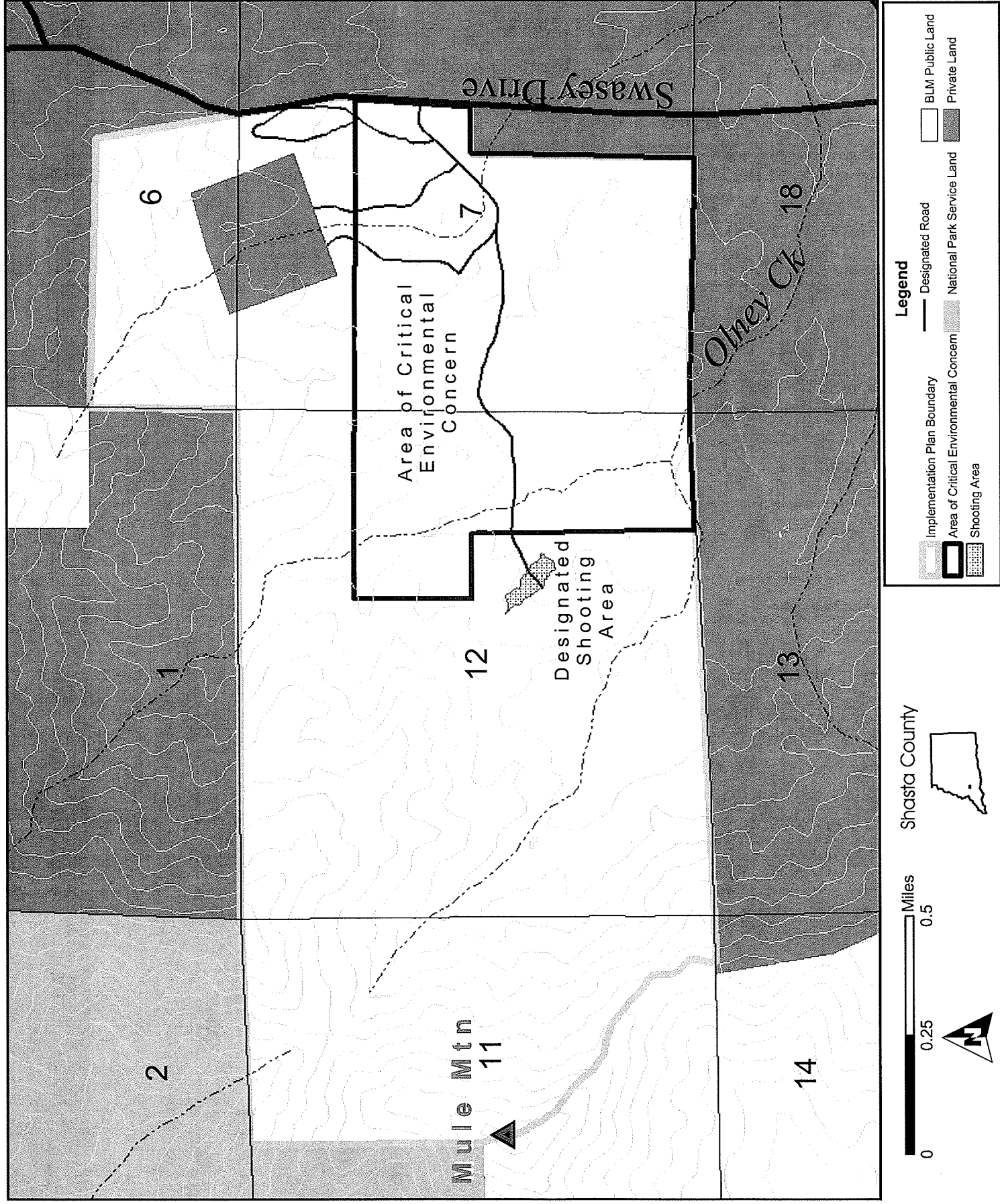
In 1993 after extensive public and internal involvement, BLM approved the RMP and Record of Decision that provides guidance for managing public lands scattered throughout north-central California, including Shasta County. The RMP identifies by subregion various land-use choices and prescriptions. Page 46 of the RMP states the need to "Develop a management plan for the long-term protection of the Swasey Drive cultural resources' ACEC (Area of Environmental Concern)." Furthermore, "The Swasey Drive cultural resources ACEC has a number of prehistoric sites that are uncommon in public stewardship (see Appendix 1). The proximity of a large population center (greater Anderson-Redding-Shasta Lake City) has resulted in ongoing damage to these irreplaceable values. Special management attention is required and designation as an ACEC is warranted." The ACEC forms the **core** or **heart** of this planning effort.



Clikapudi Corner-notched Projectile Point (Obsidian)

SWASEY DRIVE PLANNING AREA

Figure 1



The adjoining lands outside the ACEC covered by this implementation plan are experiencing substantial resource use intensities and there is enough public interest in their management that they are included as part of a larger planning effort (Figure 1). Aside from geographic continuity, and the fact that the adjoining lands are in the same upper Olney Creek watershed, this larger land area combines human-uses that originate from the ACEC and locations where there are continuing conflicts between users and resource protection. This location also provides an exact interface with the National Park Service's Whiskeytown-Shasta-Trinity National Recreation Area and an adjoining planning area.

Just before starting this planning effort, the BLM was in the process of issuing a *Federal Register* notice as a supplementary rule prohibiting the use of motorized vehicles in the planning area from 1 hour after sunset to 1 hour before sunrise. That rulemaking was cancelled in lieu of this planning effort.

Planning prescriptions for the public lands adjoining the ACEC, part of the identified Lower Clear Creek and Mule Mountain area, include: (1) enhance anadromous salmonid habitats; (2) restore the quality and quantity of riparian vegetation to Class I and II (good to excellent quality following BLM Manual 6740, Appendix 1, with "good" exhibiting some use/damage and well-rooted with sod mostly intact); (3) protect the native plant communities and associated fauna of the area; and (4) protect the historic values of the area.

Further need for this implementation plan other than damage to cultural resources is warranted based on conflicting public uses on the BLM land, expanding developments on adjoining private land, and public safety concerns. Also, this area is sustaining increased visitation since the RMP was completed. Various new interests, primarily related to recreation (horseback riding, mountain bike riding, hiking, environmental education, meditation, archaeological tours, and archery range expansion) have been expressed by the public.

B. Overall Vision for the Planning Area

This plan seeks to ensure that the remnants of prehistoric and historic habitation and events are preserved for appreciation by present and future visitors and "students of the past" and that these resources are available for scientific-based research and public-oriented interpretive opportunities. This plan considers a variety of human uses and enjoyment of the public lands within the Swasey Drive Planning Area. This plan decides between competing human uses, provides for non-motorized recreation, protects wildlife and fisheries habitat and watershed stability, seeks to protect users and neighbors alike from errant gunfire, and addresses wildland fire hazards.

C. Objectives and Standards to Meet the Goals

1. Cultural Resources: The basic objective is the protection of cultural resources from human and natural agents. Sites need to be stabilized from deterioration to the extent feasible and reasonable. Such resources also form a data base that can be studied by professional researchers, visited by local Native American Indians for spiritual and inspirational purposes, and judiciously interpreted to the public.

2. Transportation: Roads designated in the RMP will remain open. Should resource damages be judged excessive from vehicular actions, such roads will be closed and limited to special (permitted) use. Permanent road closure will require a RMP amendment.

3. Target Shooting: It is the intention to phase out the unofficial target shooting area over a four year period due to safety/liability concerns and only allow hunting within the overall planning area. During the phase out of the target shooting area only shotgun use within the existing target shooting area will be allowed with the exception of specially permitted actions such as hunter safety courses, concealed weapons training and law enforcement practice. The four year phase out may be accelerated depending on the amount, if any, of illegal incidents such as shooting away from the existing target shooting area, nighttime shooting, excessive dumping of trash, adjoining private property damage, and target and firearm-related littering. BLM reserves the right to close the existing target shooting area at any time if circumstances as listed above warrant.

4. Noxious Weeds: BLM will concentrate initial noxious weed removal on *Arundo* and Himalayan blackberries followed by other types as identified in the existing environment section. While a noxious weed-free area is an ideal, such is not practical considering some species such as star thistle.

5. Fuels and Fire: BLM plans on continuing to establish shaded fuel breaks to curtail catastrophic fires. Also, BLM intends to conduct limited controlled burns during the fall after initial rains to hold back catastrophic burns and to return portions of the area to conditions similar to those likely present during the mid-19th century prior to grazing, fire restrictions, and infestations of noxious weeds.

6. Wildlife and Fisheries: Ground-disturbing projects will maintain a 100 foot buffer from Olney Creek unless approved through project review. Federally protected anadromous species listed under the Endangered Species Act and BLM Sensitive Species (foothill yellow-legged frog, terrestrial mollusk species, and bat species) will be evaluated for presence and potential impacts prior to project approval. Game species and other fish and wildlife species are managed under Department of Fish and Game regulations and as mandated in BLM Manual 6840 (Special Status Species Management).

D. Planning Criteria / Legislative Constraints

Planning criteria are the standards or rules used for data collection and forming management plan alternatives that guide the final plan selection. Criteria are developed from appropriate laws and regulations, BLM manuals, and policy directives, as well as concerns from the public and other agencies.

E. Planning Process

Relationship to BLM Policies, Plans and Programs

The Redding Field Office is the administrative unit for the planning area with general guidance provided by the RMP. This document follows planning regulations issued under the authority of the Federal Land Policy and Management Act of 1976 (FLPMA) and in conformance with regulations established by the Council on Environmental Quality regarding the preparation of environmental documents as required by the National Environmental Policy Act of 1970. Implementation plans are undertaken under authority of 40 CFR 1600 (Code of Federal Regulations—CFR) with environmental procedures detailed in 43 CFR 1500. Most plan implementation decisions are made by the BLM State Director. Plan implementation procedures can be appealed to the Interior Board of Land Appeals under 43 CFR 4.411 and are not subject to protest provisions in 43 CFR 1610.5-2.

Major guidelines for this implementation plan also follow Federal agency responsibilities under Section 110 of the 1966 National Historic Preservation Act (Public Law 89-665; 80 Stat. 915; 16 U.S.C. 470 as amended by Public laws 91-243, 93-54, 94-422, 94-458, 96-199, 96-244, 96-515, 98-483, 99-514, 100-127 and 102-575). These guidelines were published in the Federal Register of February 17, 1988 (53 FR 4727-46) and provide general and specific responsibilities of Federal agencies in the identification, evaluation, registration, and protection for properties of historic, archaeological, architectural, engineering, or cultural significance. Because the heart of this planning effort is an ACEC designated due to the presence of significant, threatened cultural resources, these Section 110 guidelines are particularly relevant to this planning effort.

Factors that influence decision priorities relate to: (1) statutory mandates; (2) relationship to RMP decisions; (3) present risk to resources; (4) likelihood of success; (5) cost-effectiveness of actions; (6) willingness and availability of cooperators to meet similar resource objectives for adjacent non-Federal lands and resources; (7) human safety questions; and (8) budgetary and staff resource availability as projected over the next 10-20 years.

The RMP (pg. 8) states “Any change to land use allocations, restrictions or uses will be affected only through a formal plan amendment or revision prepared in conformance with BLM planning regulations found in Section 1610.4 of Title 43 of the Code of Federal Regulations. Agencies, organizations and individuals with an expressed interest . . . will be informed of any potential consequential changes and will be provided an opportunity to participate in amendment and revision processes.” In the case of the Swasey Drive planning effort, some changes could necessitate an amendment to the RMP, for example: Changing of the ACEC boundaries, termination of designated roads, and land acquisition in the planning area.

Other general relevant management guidance discussed in the RMP relate to: (1) maintaining air quality to legal and local planning standards; (2) fire management, including suppression and hazard reduction; (3) woodland management; (4) hazardous materials’ management; (5) consolidation of resource management units and land use authorizations; (6) livestock grazing; (7) minerals use; (8) maintenance of water quality; (9) prevention of impairment of soil cover; (10) offering recreation opportunities as defined by the Recreation Opportunity Spectrum; (11) conservation and management of federally listed, threatened and endangered plants, fish, and wildlife and their critical habitats; (12) keeping the area in a Class III or better Visual Resource Management class; (13) enhancing and protecting wildlife and fisheries habitat primarily through fuels management and weed eradication; (14) provide for a Desired Plant Community (i.e., less chaparral, blue oak woodland at lower elevations, more riparian growth, and mixed conifer with more open understory at higher elevations) through fuels management, weed eradication, and

plantings, if necessary; (15) more general protection or maintenance of existing resource conditions; and (16) continuation of existing leases, contracts or other authorizations unless specifically canceled or terminated following the Code of Federal Regulations. As discussed above, these various topics in most cases are integral parts of the main planning issues and recommendations for actions presented later in this plan.

F. Scoping and Planning Issues

1. BLM Internal Initial Issue Identification Process to Develop Alternatives

An internal interdisciplinary planning team was established in late 2000 to begin work on the Swasey Implementation Plan. This BLM team consists of a team leader/archaeologist and specialists in botany, range, recreation, off-highway vehicles, realty/lands, planning, wildlife, fisheries, geology and minerals, law enforcement, engineering, hazardous waste, construction/facility maintenance, and public lands' management. These employees (see a participant list in back of the document) collectively have scores of years of discipline and regional experience and are intimately familiar with the planning area.

Internal BLM planning sessions were held throughout the planning process beginning in January 2001, including a number of field visits to the planning area. There were previous ad-hoc meetings of public and private individuals during the early 1990s dealing with the issue of firearm use and safety within the area. These meetings resulted in increased BLM vigilance within the area, safety signing, restrictions of use of firearms in some areas except during the hunting seasons, and citations for various offenses in the area (538 documented incidents in the area between 1997 and August, 2003) (Appendix 2).

Finally, various management actions and activities have occurred in the planning area over the last several decades that form a planning foundation for consideration. An information kiosk was placed at the main road entrance to the planning area with other use-signing posted throughout. Much of the planning area has been inventoried for archaeological resources. Three archaeological sites have been professionally test-excavated, fenced and signed. Non designated roads in instances have been blocked. Miners have left bladed roads and trenches in a few places. Relatively large clearings (now partially overgrown) have been bulldozed for fire breaks. The ridge along Mule Mountain and the main entrance road have been modified into shaded fuel breaks. A mine shaft has been filled to protect public safety. The main designated roads through the area have been maintained on a yearly basis. Apiary use has been continuous for more than a decade. Two small wildfires were recently suppressed. Trash pickup has been continual. Various permitted recreation activities have been authorized. BLM law enforcement visits are frequent here.

2. Preparation and Distribution of the Public Scoping Document for Further Issue Identification

As part of the initial scoping for this assessment, in May of 2001 the public, tribes and various government offices were notified of this land use planning endeavor. They were invited to participate by identifying planning issues. A broad range of individuals, groups, tribes and agencies was solicited for input. These included individuals on the local BLM mailing list, neighbors, and numerous groups and agencies that were thought to potentially have an interest.

The Scoping Document for the Swasey Area Implementation Plan and Environmental Analysis Record announcement was posted on BLM's Web site and a request for input was posted at the Redding BLM office front counter. Also, a notice of the planning effort and issue identification process and study area map were posted on the BLM kiosk at the main entrance to the Swasey Drive planning area.

Eleven formal responses were received as a result of the Scoping Document solicitation. Seven of the responses were from individuals; two were from groups (Straight Arrow Bowhunters, Inc. and North State Health Improvement Network), and two were from Shasta County (Department of Resource Management and Office of the Sheriff).

The responses generally support the issues raised internally by BLM staff and the multiple use concept. Various responses were both for and against the shooting area, and shooting in general and pro and con regarding motorized vehicle use in the area, and about boundary adjustments. Public access and safety was clearly an issue along with increased law enforcement. Wildfire control considerations were strongly expressed and a general concern was conveyed that controlled burns not occur. Among the many topics raised in the letters was an advocacy for more non motorized recreation/nature trails, including those for mobility impaired individuals; interpretation; erosion control and habitat/watershed improvement; upgraded signing; and consideration of trespass problems. Support was unanimous for cultural resource protection.

3. Planning Issues and Decisions Addressed by this Plan

The Scoping Document planning issues and potential solutions' scenarios as well as a list of other concerns that may or may not be major planning issues at the time of public scoping are listed below. Offered first are the BLM's issues' assessment followed by comments from the public regarding the proposed issues and others that they introduced or augmented. Those issues considered most significant in this planning effort are **highlighted**.

Based on BLM's staff analysis and comments received as a result of the broadly distributed *Scoping Document for the Swasey Area Implementation Plan and Environmental Analysis Record*, a number of potential management problems have been dismissed from full analysis. These areas of question and rationale for their secondary consideration are presented below. These considered issues have **not** been highlighted.

a. Cultural Resources: With over one-half of the planning area identified as an ACEC because of the presence of fragile historic and prehistoric resources of National Register of Historic Places level, a paramount consideration in the planning effort is directed toward archaeological site protection, conservation, research and interpretation. Many of these cultural resources are also considered significant to local Wintu people based on numerous interactions between them and staff members. Several Wintu serve as local site stewards. The presence of burials at certain locations in the planning area correlates with spiritual locations significant in Wintu religion.

Potential Solutions: Fencing, monitoring, signing, vehicular closures, site stewardship, law enforcement vigilance, promotion of research and educational opportunities, development of an interpretive trail(s), and withdrawal of portions of the planning area from mineral entry.

b. Firearm Use: A shooting area created in the 1960s by the National Guard and general firearm use near residential developments and other recreational and public land uses have been identified as a major issue for planning consideration. While certain restrictions away from the shooting area already exist (e.g., certain zones are closed to non hunting firearm use), a determination must be made through this process on the extent, direction of shooting, and type of firearm use that will be allowed within the overall planning area and within the unofficial range specifically. Currently there is one permit for firearms training at the shooting area. A corollary concern is the trash that continues to be left behind by shooters.

Potential Solutions: Increase law enforcement vigilance; limit firearm use to hunting only; development of a formal shooting range with limited directional shooting; closure of some or all of the planning area to use of some or all firearms on a temporary or permanent basis; designation of certain fields of the shooting area for certain types of firearms (skeet, pistol, rifle, air gun, paint guns); presence of a shooting range host; shooting club adoption; reissue of the existing permit for another area and safety buffers for trail development and use.

c. Human Health and Safety: Wildfire management and prevention is of considerable concern in the Swasey area, a wildland-urban interface. Other concerns are (1) the dumping of trash, and (2) possible hazardous waste and lead contamination within the existing target shooting area and Olney Creek and the water table contributing to this stream. BLM is highly concerned with the public's safety and the agency's liability in developing or promoting certain types of uses where safety is a particular concern. It is the agency's hope that what uses or use levels are compatible with public safety can be resolved through this planning effort.

Potential Solutions: Careful construction of fuel breaks within the planning area as along the main east-west road corridor; proper timing and direction of low intensity controlled burns. Maintenance and expansion of existing fuel breaks. Clean-up of lead contamination in existing target shooting area.

d. Motorized Vehicle Use: What level of motorized vehicle use is compatible with the planning area's natural and cultural resources? What controls are necessary to curb motorized vehicle use beyond designated routes within the planning area and to control speeding? How could the access to the private in-holding be accommodated if the parcel is not acquired by BLM?

Potential Solutions: Further limit designated routes; better motorized vehicle control through fencing, barriers, and signing; limitations or closure to motorized vehicles within the planning area; law enforcement vigilance; careful placement of cleared corridors for fire prevention and other uses.

e. Accelerated Soil Erosion: Certain zones of the planning area are experiencing heavy erosion (> 1 surface acre/year) primarily due to vehicular use. How can such use be curtailed and what can be done to rehabilitate damaged areas?

Potential solutions: Further restrictions on vehicular use within the area through road or area closure; barriers; fencing; signing; and ranger patrol. Scarification, mulching and planting of native vegetation in damaged areas. Construction of water bars on certain roads; road and area graveling and maintenance. Rehabilitate modern mining trenches.

f. Riparian Habitat Condition: Preliminary field surveys and examination of aerial photographs since 1962 show no major degradation of riparian condition other than the construction of a small dam, reservoir and road by the National Guard during the 1960s. No activities are proposed through this planning effort that is thought to degrade riparian vegetation. Consideration was given to rehabilitating the dam location, but new growth of riparian vegetation since it was breached seems to preclude any action. Should removal of sediments accumulated behind the dam prove to be a problem they can be easily removed. Invasive species situated in a few riparian locations are generally localized and subject to removal as part of BLM's general weed eradication program. Other considerations such as sediment contribution and hazardous materials input that might affect downstream fisheries are discussed separately. While Olney Creek may have run year-round during historic and prehistoric times, growth of vegetation on the surrounding hillsides resulting from fire suppression and perhaps the effects of historic mining (e.g., streambed alterations, ditching, hillside sluicing) have reduced runoff.

There are questions regarding the state of riparian vegetation along Olney Creek branches within the planning area. Has riparian damage, if present, harmed fisheries? Can riparian degradation, if at hand, be reasonably and cost-effectively improved? Have past erosion and mining limited the government's ability to rehabilitate the stream's riparian growth, if, in fact, it is in need of rehabilitation?

Potential Solutions: Replanting of stream banks. Adopt a watershed program for local schools or groups. Eliminate erosion. Rehabilitate the old National Guard reservoir/dam. Let natural processes take their course. Selectively remove introduced blackberries, *Arundo* and other noxious weeds. Install a culvert across Olney Creek water crossing. Monitor for fish use in cooperation with California Department of Fish and Game or others and tie work to downstream efforts.

g. Boundary Modification: Are the current public land boundaries desirable in terms of fiscally responsible management and resource protection? An irregular block of private land exists within the planning area. The nearby Straight Arrow Bowhunters, Inc. has expressed an interest in purchasing adjoining land on the west side of Swasey Drive. BLM administered land in Section 6 and the N ½ of the N ½ of Section 7 scheduled for disposal hold resource values that are comparable and compatible with the larger planning area. Should these lands be retained rather than earmarked for disposal as proposed in the RMP?

Potential Solutions: Dispose of portions of the planning area to Straight Arrow Bowhunters, Inc. to provide for use overflows (through sale, exchange or other means). Dispose of public lands to private in-holder to provide a manageable boundary in a similar manner. Alternatively, purchase private in-holding from a willing seller or maintain status quo. Maintain land in public hands next to bow club to provide a manageable boundary (Swasey Drive) and a buffer to cultural resources and general recreation use. Provide private/public land postings.

h. Recreation Trails: What trail development is desired for this planning area? Public interest has been expressed in one or more non-motorized recreation trails between Swasey Drive and Mule Mountain Road/Whiskeytown, part of a greater non-motorized recreation trail system in the west Redding/Whiskeytown-Shasta-Trinity National Recreation Area. A connecting trail is presently being completed west of the Swasey planning area and the

City of Redding is working on a trail connection between Swasey Drive and Mary Lake using trails of the Westside Trail System.

Potential Solutions: Several possible east-west alignments on the south and north sides of the planning area have been proposed and trail construction on one such trail is in progress (Figure 2). Conflicts with other recreational uses would have to be resolved, as between firearm use and horseback riding. Trail use could be integrated with cultural resource interpretation.

i. Minerals Management and Minerals Withdrawal: While mining has been an important element of past land use in the area, there has been little interest expressed in mining within the area in the last 15 years or so. While the area is open to mining entry, a plan of operation must proceed through a detailed review and environmental analysis before any non casual use operation can proceed within the ACEC.

Potential Solutions: Controlled, localized mining can be compatible with environmental protection and public use. ACEC specific mitigation measures can be imposed.

j. Special Status Species: Searches of BLM Redding Field Office wildlife, fisheries, and botanical records; the California Natural Diversity Data Base historic records; field botanical surveys; and GIS data analysis reveal no federally threatened and endangered resources or BLM Sensitive Species. However, BLM Sensitive Species (foothill yellow-legged frog, bat species, and terrestrial mollusk species) may be found in the area and could conflict with other uses.

Potential Solutions: Project-related surveys prior to implementation to protect any special status species that might be present; 100 foot stream corridor buffer except at current developed crossings.

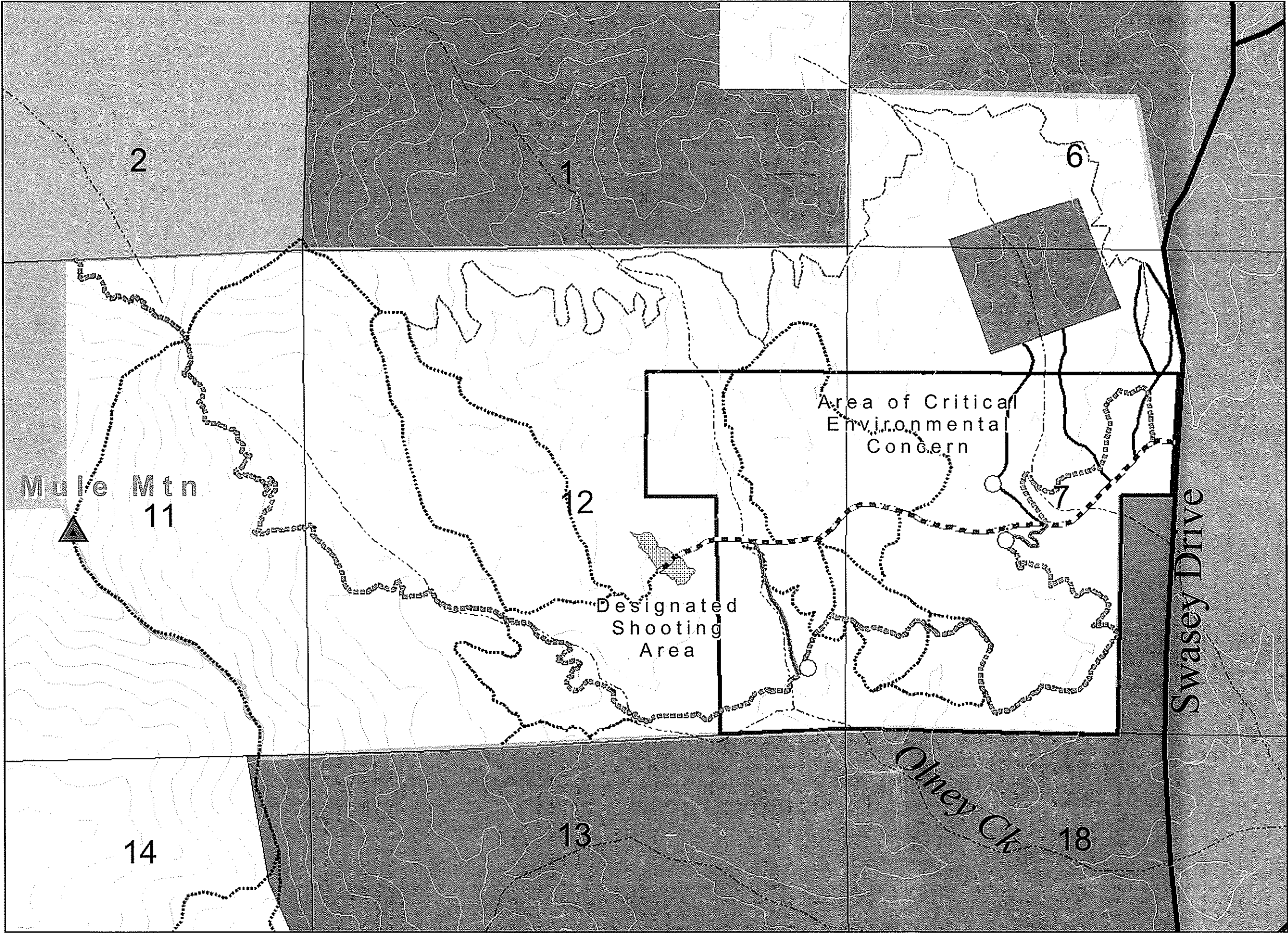
k. Fisheries: Near the Sacramento River, Olney Creek is an important fish habitat. It is ephemeral in the upper-reach where it flows through the Swasey Drive planning area. During the summer the creek heats up and dries. Furthermore, it is affected by historic mining disturbances (diggings and tailings) and the remains of several small dams below the planning area. Fish are limited, but not totally curtailed from reaching this location. California Department of Fish and Game personnel do not consider upper Olney Creek to be important fish habitat, but there may be federally protected salmonid species present during part of the year and the public has expressed a concern with protecting upper drainage fish.

Potential Solutions: (see j above).

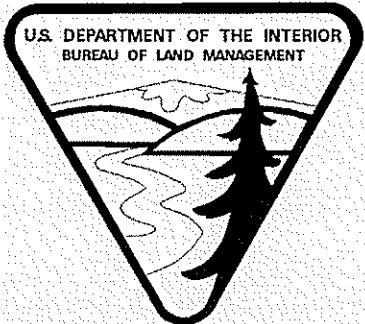
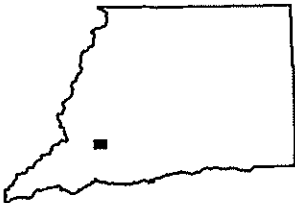
4. Issues Considered but not Further Analyzed: Air quality, visual quality, water quality, flood plains, farm lands, environmental justice, caves, wetlands, wilderness values, wild and scenic river values, terrestrial habitat, non threatened or endangered wildlife species, hazardous materials away from the existing target shooting area and immediate watershed, livestock operations, and certain timber harvest practices. These are not judged to be significant issues relevant to this planning effort.

PROPOSED AND EXISTING TRAILS
SWASEY DRIVE PLANNING AREA

Figure 2



Shasta County



Legend

- Implementation Plan Boundary
- Area of Critical Environmental Concern
- Shooting Area
- Road Class
 - 2
 - 3-4
 - County Roads
- Interpretive Sites
- Trails
 - Primary E-W
 - Existing
 - Proposed
 - Suitable for Wheelchair Access (Proposed)
- National Park Service Land
- BLM Public Land
- Private Land

CHAPTER 2 -- PROPOSED MANAGEMENT PLAN AND ALTERNATIVES

Based upon extensive staff review and public input a number of alternatives for the planning area are presented, including the no action alternative. These alternatives represent the full range of possibilities offered by the various discussants and reviewers of the scoping document and are keyed to the major planning issues identified in this and previous planning undertakings (archaeological site protection and interpretation, safety, firearm uses, multiple recreation uses of a passive and active nature, and ecosystem protection and enhancement).

A. Management Activities Common to Each Alternative

There are a number of land use consistencies present with respect to all alternatives that were developed based on agreement by all parties and/or requirements by law, regulation and policy. In this regard there are ongoing BLM activities that will continue:

Action 1: Archaeological Site Protection and Interpretation: Archaeological sites will continue to be monitored by BLM personnel and stewards for their protection and stabilization, and appropriate actions will be taken at such sites to maintain their integrity. Protective fences or barriers as existing or needed will be constructed and repaired (see individual action plans). Select sites will be interpreted and research by qualified personnel and institutions will be encouraged. Coordination with the Wintu will continue with regard to all aspects of prehistoric site management and their heritage concerns, including an ongoing site stewardship program. All surface disturbing activities will be subject to compliance with Section 106 of the National Historic Preservation Act as codified in 36 CFR 800, the American Indian Religious Freedom Act of 1978, and the Native American Graves Protection and Repatriation Act.

Action 2: Law Enforcement Patrol and Assistance: In addition to visitor services patrol presence, BLM law enforcement rounds will be made to the planning area to the extent the need and resources permit. As a guideline, a minimum of one patrol visit per week, predominately on weekends and holidays, will be conducted. BLM law enforcement officers will issue citations for violations of all appropriate laws. Other BLM personnel and archaeological site stewards will also keep an eye out for illegal activities and inform law enforcement personnel as soon as feasible of such activities.

Action 3: Protection of Water/Soil Quality: Any construction activities, road use and unauthorized activities will be monitored to minimize impacts to soil and water quality. Water crossings on designated vehicle routes will have a culvert of appropriate size or a turf-supported block low water crossing to prevent stream bank erosion. Principal currently eroded areas will be stabilized as discussed below with regard to specific actions. Trails will be maintained to minimize erosion. Rolling and drain dips, water bars, and out sloping will be included in the design of any new trails (provided there is no damage to integrity of historic features such as the Clear Creek Ditch) and on existing trails and roads where needed. Modern mining trenches will be backfilled using a backhoe and/or by hand. Following closure of the shooting area any hazardous materials such as the lead bullets will be disposed of properly.

Action 4: Public Health and Safety: Efforts will continue to maximize the safety of both visitors to the public land and adjoining private land owners. This will include judicious signing and ranger/special agent patrol and enforcement of law and regulation, periodic review of allowable activities and management direction, directed visitor activities through management facility development and land use as discussed in the actions section below, and encouragement of visitor safety through various educational channels including brochures, web sites, public outreach, and other means.

Action 5: Protection of Wildlife and Fisheries Habitat: No surface disturbances will be authorized by BLM within any key habitat area (e.g., riparian zone, seep, oak grassland area). A trail may pass through or close to such habitat if design restrictions limit access to the crossing itself. If sensitive habitats are later identified, these can be fenced for avoidance to prevent intrusion and habitat damage. Fisheries improvement will be coordinated with California Department of Fish and Game and could include fish barrier removal, riparian vegetation improvement, and stream-course restoration actions as determined appropriate by these agencies in cooperation with BLM. Ground-disturbing projects will be kept 100' away from Olney Creek unless related to wildlife and fisheries habitat improvements. Other projects will need to be assessed for protected species and effects prior to implementation following Endangered Species Act and BLM regulations.

Action 6: Recreation Use: Recreation will continue and be encouraged. Such uses include permitted primitive camping (via Special Recreation Use Permit), birding, sightseeing, hiking, horseback riding, bicycling, hunting, recreational mineral collecting, and driving on designated routes.

Certain recreational activities are not compatible with protection of the cultural and natural resources of the area. An example of incompatible uses is large group concerts with amplified music of the type known as "rave parties." Recreation such as paint ball battles or contests also is not compatible with the management goals for the area.

Action 7: Environmental Education: Formal and informal environmental education, including adopt a watershed, adopt a site, school outings, interpretive field trips, etc. will be encouraged through various informational outlets.

Action 8: Commercial Mining: All non casual use (commercial) type mining and mineral exploration will be conducted in accordance with the 43 CFR 3809 Surface Management regulations and any applicable State and local laws. All non casual use type operations within the ACEC will require an approved Plan of Operations and a reclamation bond. In addition, as per Federal Register, Vol. 66, No. 210, p. 54838, October 30, 2001, the following "protective condition to prevent irreparable damages" will be established within the ACEC:

No mining or mineral exploration activities (or associated actions) may occur within the Swasey Drive ACEC that would irreparably damage any important cultural or historic resources or their ambient setting which has been determined as significant by BLM.

Miners and prospectors wishing to camp must obtain a camping permit. If camping is longer than 14 days per year, they must first obtain an occupancy concurrence per 43 CFR 3715.

Action 9: Existing Utility/Transportation Rights-of-Way: Existing utility-based rights-of-way along Swasey Drive will continue under a permit. New facilities or road development/enhancement along this transportation/utility corridor will be allowable subject to environmental review procedures with placement as close to the existing pavement as possible and avoiding all significant archaeological sites.

Action 10: Protection-Information Facility Maintenance/Signing and Visitor Information: Existing and proposed signs, fences, kiosks, access roads, culverts, etc. will be maintained and, as appropriate, enhanced or augmented in keeping with the primary management direction of this management area. BLM boundaries will be signed. Informational brochures and signs, trail head signs, and trail maps will be developed to provide information on important items such as:

1. User etiquette, regulations and requirements;
2. Health/safety and first aid tips;
3. Ambulance/hospital locations;
4. Fire reporting procedures;
5. Law enforcement capabilities/contacts;
6. Bureau of Land Management office location;
7. Hospital and community hospitality locations;
8. Interpretive information about the area's history, prehistory, Indian culture and natural resources

Action 11: Prevent Private Land Trespass: Those trails, roads, or ways providing unwanted access onto adjoining private lands will be closed, signed, and barricaded to prevent trespass. Trails will be designed to prevent motorized vehicle use and discourage people from intruding onto adjoining private land by use of a combination of actions listed above.

Action 12: Fire Protection/Prevention and Vegetation Management: BLM will continue to explore methods to safely prevent wildland fire. These include continued construction of shaded fuel breaks, low-to-moderate intensity prescribed burns, public education, signing, campfire restrictions during dry seasons, regulation of mechanized equipment such as spark arresters, cooperative fire suppression with the California Department of Forestry and Fire Prevention (CDF), and non mechanized fire suppression in the ACEC. CDF will be provided a map of the non mechanized fire suppression area for distribution to their responsible fire units. Fuel breaks require periodic treatments (every 4-10 years) to maintain their effectiveness including re-cutting the vegetation with hand mechanized equipment such as chainsaws or weed cutters, prescribed fire, biological methods such as goats, and/or direct herbicide application. Goals of prescribed fires for this area are to reduce the threat of catastrophic wildland fires to existing resources on BLM land and adjacent urban interface values. Due to close proximity to this urban fringe, prescribed fire projects will be limited to low or moderate heat intensity operations conducted only out of fire season when fire danger is low. Adjoining landowners will be notified in advance of such projects. There will be a press release one week prior to the action. All locations within the planning area are considered for such practices.

Action 13: Removal of Noxious Weeds and Plants: Noxious weeds and plants will be removed following integrated pest management principles on a case by case basis with initial attention paid to *Arundo donax* and Himalayan blackberry (*Rubus discolor*) patches.

Action 14: Trash Removal/Cleanup: Modern trash will be cleaned from the planning area and dead fall will be removed from facilities, trails and roads.

Action 15: Road and Trail Maintenance: Designated roads will be maintained on an as-needed or periodic basis. The primary east-west road will be kept to a Class 3-4 level (see Appendix 3 for road standards) unless unauthorized uses reach an unmanageable level. Such a level is measured by evidence of 15 unauthorized vehicle transgressions off road in any one year or any impacting transgression (over five cubic yards of damage) to a prehistoric site. Subsequently, the road will be closed to general motorized vehicle entry following the plan amendment process. Then the road will be maintained for administrative, special permit and public non motorized uses at a Class 2 level (see Appendix 3). Primary recreation trails will be maintained.

Action 16: Administration: Solicitation of volunteer assistance and funding for management, research and education will be sought on a yearly basis or as needed. Projected operation and maintenance funding requirements as well as finances for other needs such as archaeological site protection and research are shown in the Cost and Labor Estimates and Project Implementation Phasing Table at the end of this document.

Action 17: Land Tenure Decisions (except under Existing Management situation): The private in-holding will be acquired at fair market value should the owner be willing to sell or exchange parcel. Public lands within Section 6 and the N ½ of the N ½ of Section 7 will not be sold or exchanged as discussed in the 1993 RMP due to resource values compatible with the remainder of the planning area. Acquisition of the private in-holding will require a separate plan amendment.

B. Existing Situation, Proposed Action and Alternatives

No Action—Continuation of Existing Management

This alternative provides for a continuation of management actions and uses existing at the time of the formulation of this plan (2003-2004) including those listed above plus (1) the informal service of a target shooting area constructed by the National Guard in the 1960s; (2) placement of bee hives under an apiary permit at select areas accessible by designated road and (3) motorized vehicle use on current designated routes. BLM will continue to consider disposal of public lands in sections 6 and 7 and not seek acquisition of the private in-holding. Various group activities and land-use actions will need to be considered on a case by case basis consistent with the protection and interpretation of cultural resources within the ACEC and environmental review (see Figure 1). Continuation of the existing management situation is considered the “**no action**” alternative for purposes of the National Environmental Protection Act.

Rationale for non Selection: This alternative as a whole is not considered since there are current considerable conflicts between uses that occur in the area. Implementation of this alternative will continue reactive, inefficient resource management and will not take advantage of beneficial resource management opportunities available within the planning area. This alternative does not present a concentrated approach to land management. It will eliminate

contributions from many individuals and their ideas that have been focused on the area and its surroundings.

ALTERNATIVE 1: (Proposed Action) Resource Protection Emphasis and Qualified Recreation Uses

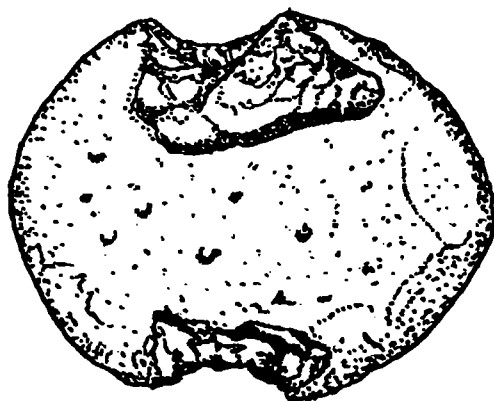
The area will be closed to motorized vehicle use from sunset to sunrise beyond the main trail access parking area (see Figure 3) just off Swasey Drive. This will be regulated by signing and law enforcement patrols. Vandalism, shooting, littering and drug use have been problems, more so during nighttime hours when law enforcement presence is less likely. The night time activity deters lawful public use, damages natural and cultural resources, and creates a public nuisance. BLM can reduce this type of unlawful activity and enhance the setting for valid recreation use by requiring a permit for night time activities related to motor vehicle use/access. The planning area will be open to motorized vehicle access from sunrise until sunset with a 15 mile per hour speed limit. After those hours, visitors (with the exception of those through disabilities confined to motorized wheelchairs) planning on using motor vehicles for access to the planning area must obtain written authorization from a BLM authorized officer to use motorized vehicles beyond the entryway parking area. Written authorization will be in the form of a Special Recreation Use Permit or equivalent instrument as determined by the BLM authorized officer. Law enforcement personnel and other public servants or their agents specifically authorized by the BLM are exempt from this closure.

Fencing/boulder alignments and gating will be placed along the principal entryway to channel vehicle travel. The gate will enable BLM the opportunity to close the area to motorized use should public safety become threatened and/or impacts to natural and cultural resources become unacceptable (see Figure 3). The threshold for damage to soils or other resources is more than 20 off road vehicle intrusions per year off designated routes, noticeable damage to archaeological sites or features, or more than 1,000 square feet of surface disturbance per year.

Near the Swasey Drive entrance a fenced or boulder-lined parking lot will be constructed large enough to accommodate horse trailer use and parking for about 20 vehicles. Non-vehicle access will be accommodated should the gate be closed. Closing all routes to motorized vehicle use will be formalized through an approved plan amendment should management judge there to be increased safety and resource concerns as noted above. Daytime vehicular access beyond the entryway parking area, if the area is closed to general motorized vehicular use 24 hours a day, will be allowable on 1993 RMP designated roads through a special permit for approved activities.

Portions of sections 6 and 7 earmarked in the 1993 RMP for disposal will not be sold or exchanged due to resource protection concerns and variable public use demands. The private in-holding will be acquired provided the seller is willing and it meets BLM's fair market value and hazard-free criteria. This will require a plan amendment.

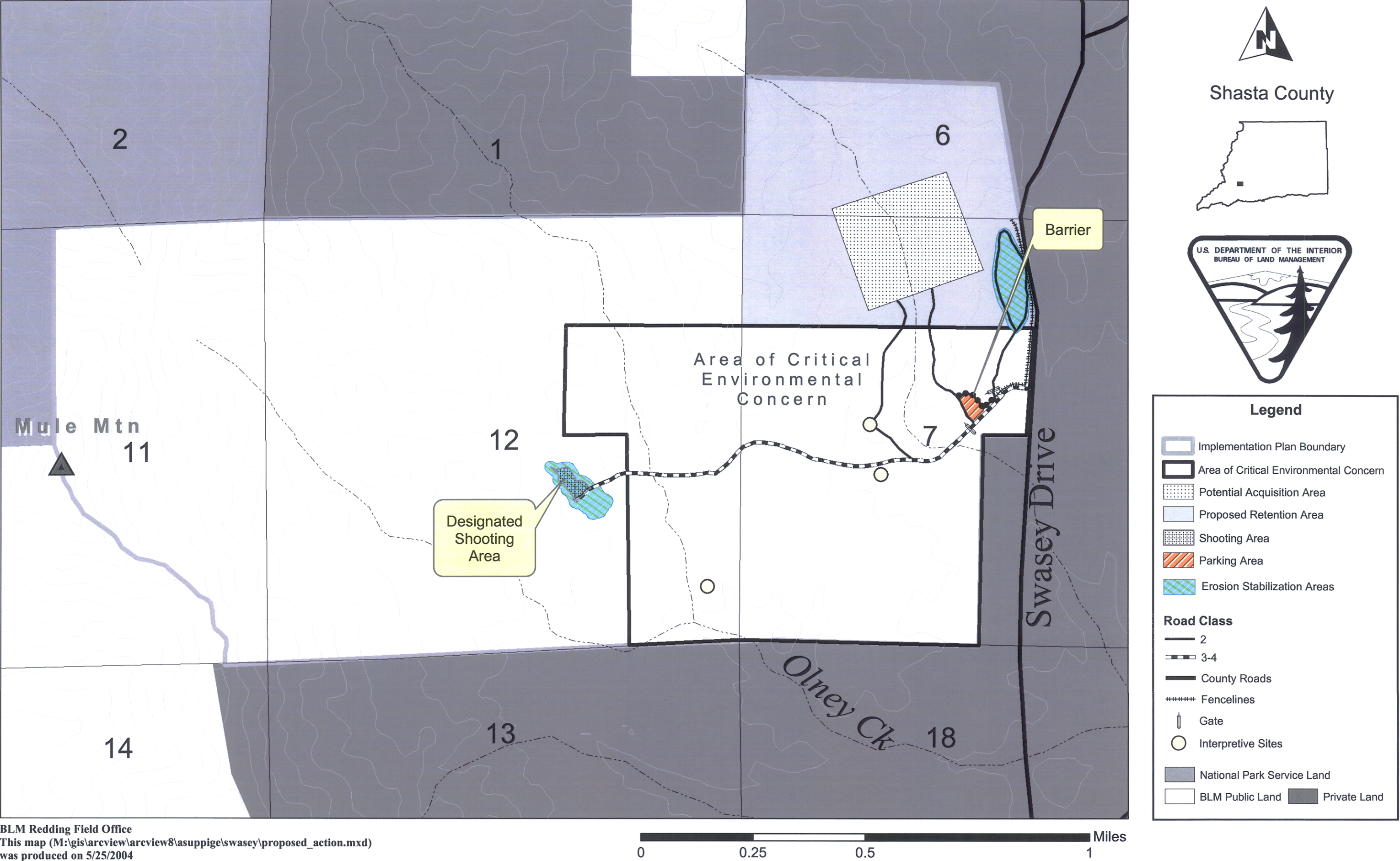
The existing target shooting area within its current northwesterly half will be opened to target shooting only using shotguns during the day (sunrise to sunset). Special Recreation Permit shooting for hunter safety, law enforcement practice and concealed weapon permit training will be allowed for all legal firearm use in this northwesterly portion. The area open to shooting will



Stone Net Weight (Middle Mule Pond)

PROPOSED ACTION
SWASEY DRIVE PLANNING AREA

Figure 3



be designated by signs, boulders and a map posted on the entryway kiosk and available at the BLM office. Only portable targets, paper targets and biodegradable clay pigeons will be allowed. **The entire target shooting area will be closed to all shooting (other than hunting) after a four year period following completion of the Decision Record.** The shooting area may be closed prior to the four year phase out period should safety concerns become more apparent (i.e., public complaints and verifiable incidents) and/or resource damage and trash dumping continues. Subsequently, the shooting area will be open to variable recreation activities with the existing road to the area remaining open to the public.

The target shooting area will be reclaimed after closure (with the southeasterly one-half reclaimed earlier if funds are available) through lead removal, scarification, re-contouring to a natural setting, mulching, and planting of native species.

The principal east-west open road from Swasey Drive to the current shooting area will be maintained to a Class 3/4 standard on a yearly basis with other designated routes minimally maintained (Class 2) on a periodic basis with seasonal closure an option due to wet conditions or fire danger. Designated roads may be closed because of seasonal conditions or fire danger. Other roads and trails will be blocked from motorized vehicle use and signed as closed to such use. Signing and barriers/fencing will be placed to prevent off-road vehicular incursions into the planning area from passable locations such as off the road bank along Swasey Drive, from shaded fuel breaks and old roads to the west and north by Mule Mountain, and from locations within Middletown Estates to the south.

Non-designated ways, tracks and trails will be blocked and signed as closed to motorized vehicle use. Signing and barriers/fences will be placed to prevent off-road vehicular incursions into the planning area from passable locations such as off the road bank along Swasey Drive, from shaded fuel breaks and old roads to the west and north by Mule Mountain, and from locations within Middletown Estates to the south. Locations where illegal off-highway motorized vehicle use is occurring will be signed and access blocked through unobtrusive barriers.

Non motorized east-west trails will continue to be developed on the north and/or south sides of the planning area and as part of a ditch-grade loop trail, at least one such through route (Mule Mtn./Wintu Trail) potentially tied to the Westside Trail connecting Whiskeytown National Recreation Area and private lands to the east. These trails will be suitable for access, walking, hunting, horseback riding and mountain bike riding. Select segments of these routes may be designed to accommodate disabled persons. Chosen segments of the Clear Creek Ditch will be restored (with minimal change to the ditch configuration) for non motorized trail use with at least one segment possibly developed for disability access. Other trails may be developed and older roads can serve as primitive trails (see Figure 2). Volunteer groups will be solicited to assist in maintenance and safety related assistance.

Public interpretation signing such as anodized single post and/or carsonite signs may be placed at the Boswell Mine, Tanya Site, and along the Clear Creek Ditch trail. Signs and/or brochures will discuss the resources, the area's culture history, and protection-related laws. These cultural locations will be kept clean of modern trash and hand brushed and maintained for visual integrity. Other interpretive signing regarding natural resource values will be erected at select locations along roads and trails. An informational and interpretive brochure will be developed

for the area and made available at the entryway kiosk, the BLM office, and at other select locations, such as in mounted boxes at key resource locations.

Heritage-related tourism will be encouraged for select protected sites as listed above through advertisement, web listings, and brochure/kiosk development. An access gate will be constructed at the Tanya Site. A non-obtrusive access trail to site features can be constructed should there be sufficient demands based on brochure distribution and needs expressed to the BLM (at least five responses within two years).

An informal camping area opposite the Straight Arrow Bowhunters, Inc. property along Swasey Drive will have erosion stabilized through scarification, mulching and planting of native grasses and shrubs or capping with material such as gravel. Straight Arrow Bowhunters, Inc. (or similar groups) through permit may use this area for major shoots and other activities provided soil disturbance can be minimized.

Hunting will remain open throughout the planning area. The planning area will be closed to any other non-hunting related discharge of firearms. The sole exception is the northwestern part of the current shooting area which will be open to shotgun shooting and special permitted actions previously described for a four year period following approval of the plan. After shooting area closure only hunting-related shooting will be allowed at this specific location.

Placement of bee hives at two approved locations will be allowed should an application be received. Such approval is on a first-come first-serve basis. If no permits are sought within a two-year period, then this use will no longer be permitted in the planning area.

Rationale for Selection: This alternative emphasizes management for cultural and natural resource protection and interpretation. It provides recreation opportunities and intensities that are compatible with resource protection and public safety. This alternative fits best within projected BLM workforce levels and anticipated funding.

ALTERNATIVE 2 -- Public Recreation Alternative

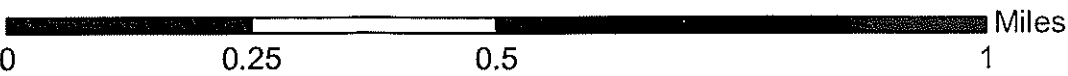
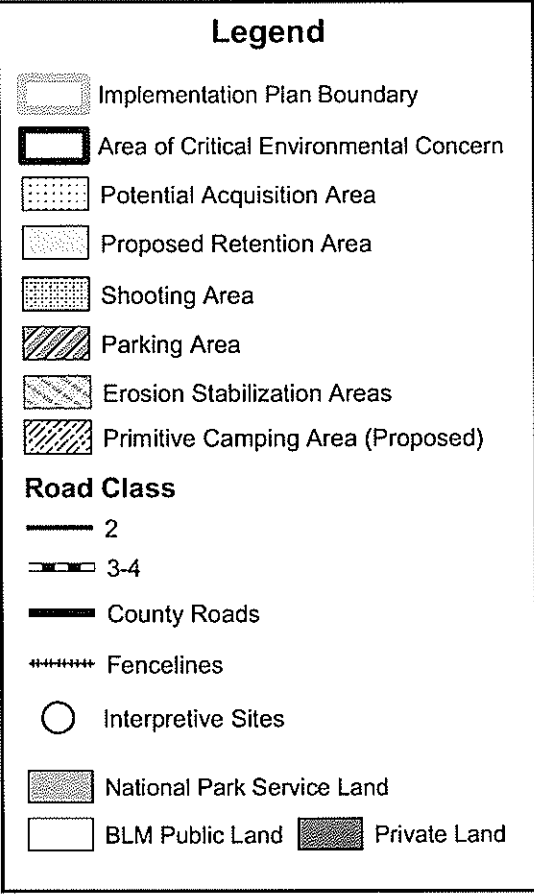
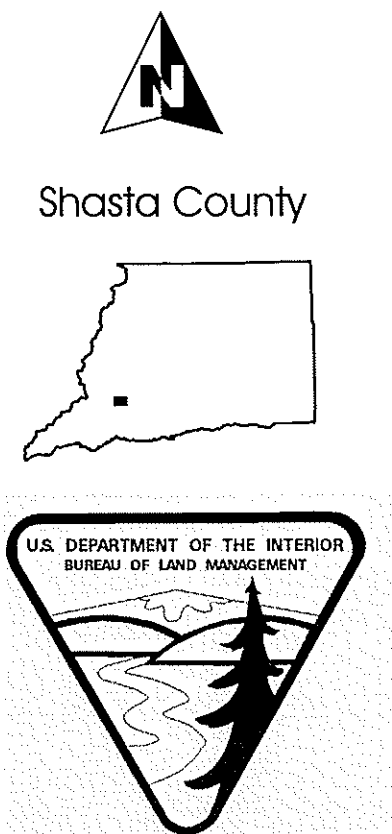
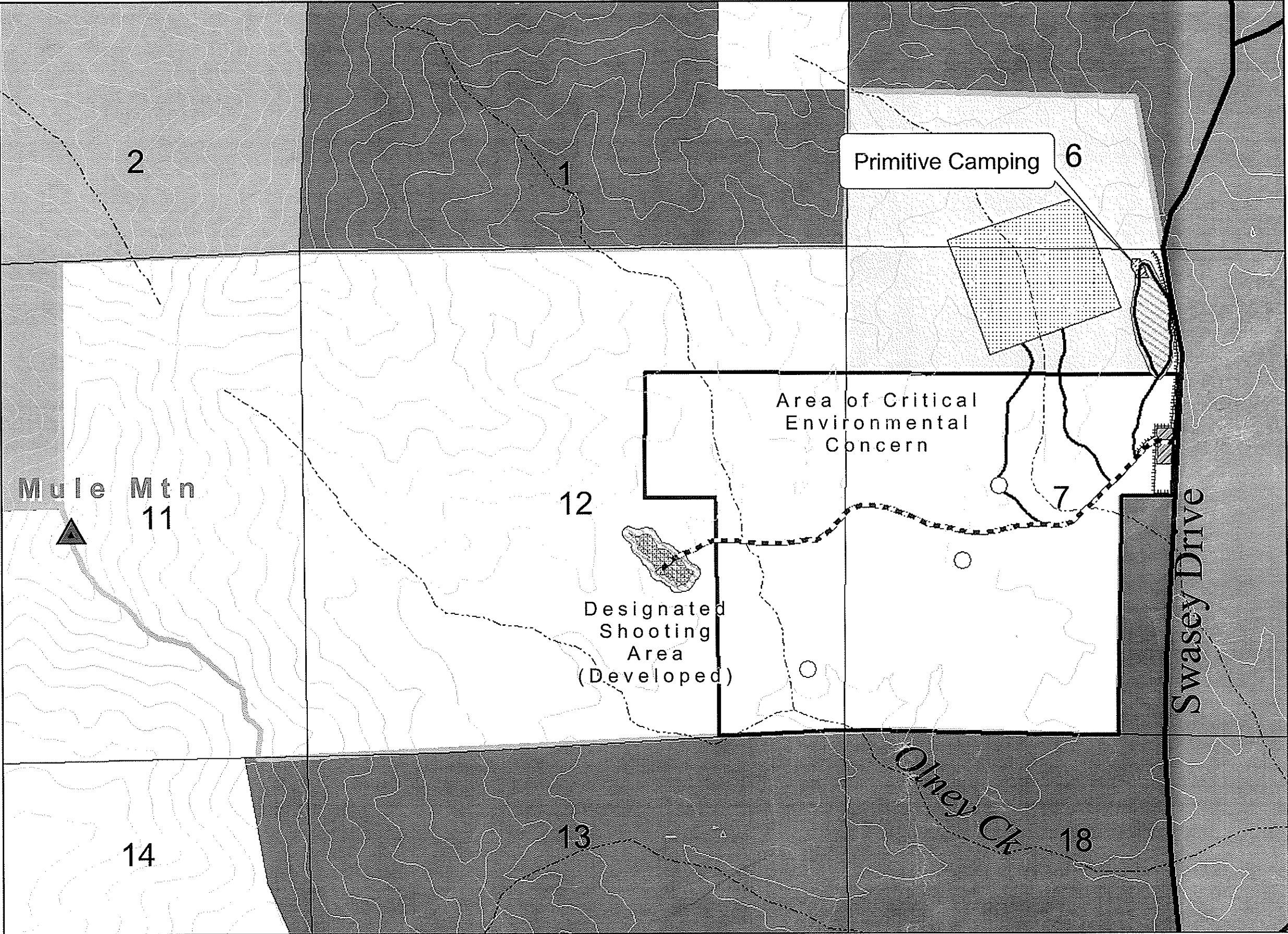
This alternative focuses on managing the area as an intensive public recreation area with a focus on site interpretation and multiple recreational uses while protecting the values of the ACEC (Figure 4).

The main east-west access road will be maintained to a Class 3-4 standard (see Appendix 3 for standards). Current designated routes for off-highway vehicle travel will be maintained to a Class 2 standard on at least a yearly basis. Other roads and trails will be blocked and signed as closed to motorized vehicle use. Signing and barriers/fences will be placed to prevent off-road vehicular incursions into the planning area from passable locations such as off the road bank along Swasey Drive, from shaded fuel breaks and old roads to the west and north by Mule Mountain, and from locations within Middletown Estates to the south and from the proposed primitive campground opposite the Straight Arrow Bowhunters, Inc. property.

The shooting area will be developed in cooperation with the National Rifle Association and/or gun club representatives to comply with safety concerns including the establishment of two or more bulldozer-trenched target areas with shooting benches facing northwest; a short high bank

ALTERNATIVE 2
SWASEY DRIVE PLANNING AREA

Figure 4



pistol area facing north in the upper area of the current target shooting area and a skeet area facing southwest. Shooting will be prohibited to the south, southeast and east through signing and rehabilitation of shooting area environs in that direction. Only portable gongs, paper targets and biodegradable skeet are allowed. Toilet and trash receptacle facilities will be provided. There will be a nighttime closure of the shooting area. Locations of the shooting area will be shown on recreational maps and signs. Field personnel will be instructed to direct visitors to the recommended area.

Non motorized east-west trails may continue to be developed and maintained on public land on the north and/or south sides of the planning area (with landform safety/noise buffers from the shooting area) and as part of, and/or independent of a ditch-grade loop trail, depending on final alignments. At least one of these trails will form part of the Westside Trail system connecting Whiskeytown National Recreation Area and trail segments to the east on private land. These trails, and other old roads available for primitive travel, will be signed and maintained on a yearly basis or as needed. Trails will be suitable for walking, running, and horseback and mountain bike riding. One or more segments of these trails may be suitable for disabled person use. Volunteer groups will be solicited to assist in maintenance and safety issues.

Public interpretation signing may be placed at the Boswell Mine, Tanya Site, and along the Clear Creek Ditch trail. The Boswell Mine complex will be selectively cleared of vegetation and all modern trash for visibility and interpretation. A primitive group campground will be established opposite the bow range along Swasey Drive. Hunting throughout the area will remain open and non hunting recreational shooting will be prohibited away from the shooting area. Development of bow and arrow target use opposite the bow range during major Straight Arrow Bowhunters, Inc. events will be allowable provided surface disturbance can be minimized.

Placement of bee hives under a permit will continue at select locations away from the shooting area accessible by designated road provided the demand continues. Should two years pass without permit application such use will be terminated.

The Section 6-7 land disposal will not occur due to resource value concerns as previously discussed under the proposed plan. If a willing seller is found, acquire the private in-holding through purchase or exchange following the plan amendment process/approval.

Rationale for Non Selection: The alternative is not selected because of safety and liability concerns from the presence of a formal or semi-formal firearm shooting range and close proximity to housing; law enforcement and management demands beyond resource area wide capabilities under existing budget and work power constraints; and the potential for indirect impacts to cultural and natural resources from perceived heavy visitor use and overflow.

ALTERNATIVE 3 – Mixed Public Use and Resource Protection

This alternative is a mix of generally passive, dispersed recreation use, archaeological site protection, and interpretation of resources (Figure 5). The area will be closed to motorized entry (except disabled-person motorized wheelchairs) with the exception of special permitted activities or approved rights-of-ways such as one to the private parcel within the greater planning area. Official closure will need to follow BLM's plan amendment process. A gate and fencing

and/or boulders near the main entryway will be placed to control access. The fence and gate will be constructed to allow passage of horses, bikes, motorized wheelchairs, and people. The main road into the planning area will continue to be maintained at a Class 3-4 level for administrative and special use purposes (see Appendix 3 for road standards). A small parking lot will be built near the entryway suitable in size to accommodate horse trailer entry and exit and approximately 20 vehicles. This will also aid in eliminating illegal vehicular use on the adjoining hillside. Signing and barriers will be placed to prevent off-road vehicular incursions into the planning area from passable locations such as off the road bank along Swasey Drive, from shaded fuel breaks and old roads to the west and north by Mule Mountain, and from locations within Middletown Estates to the south.

The existing gun range will be opened for organized events or group shoots only under a permit with use prohibited after dark or 5:00 p.m., before 9:00 a.m., and not on Sundays, Thanksgiving, or Christmas. Only portable gongs, paper targets and biodegradable clay pigeons will be allowed. The entire area will be closed to motorized vehicle use during nighttime hours. The range will be modified to include bulldozed shooting trenches and banks as described in Alternative 2.

Non motorized east-west trails will be developed and maintained on the south and possibly the north sides of the planning area and as part of a ditch-grade trail. One such trail (Mule Mtn./Wintu Trail) will pass through the area from east to west as part of the Westside Trail system connecting Whiskeytown National Recreation Area and private lands to the east. These trails will be suitable for walking, horseback riding and mountain bike riding. Select segment(s) of these trails may be suitable for disabled person use. Volunteer groups will be solicited to assist in maintenance and safety issues.

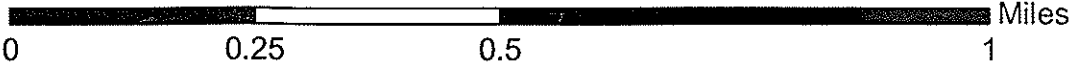
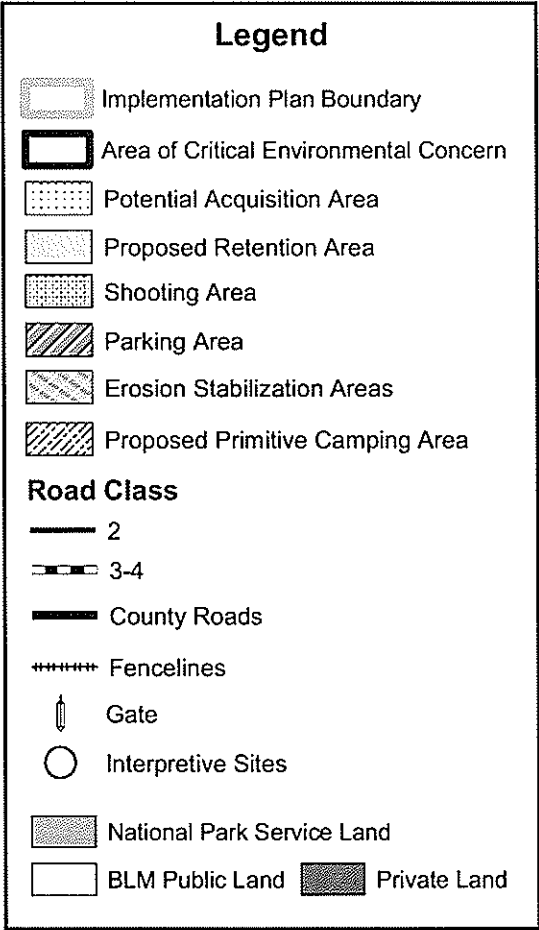
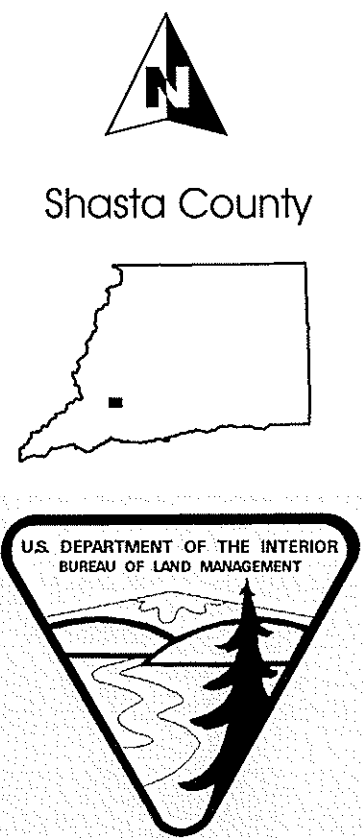
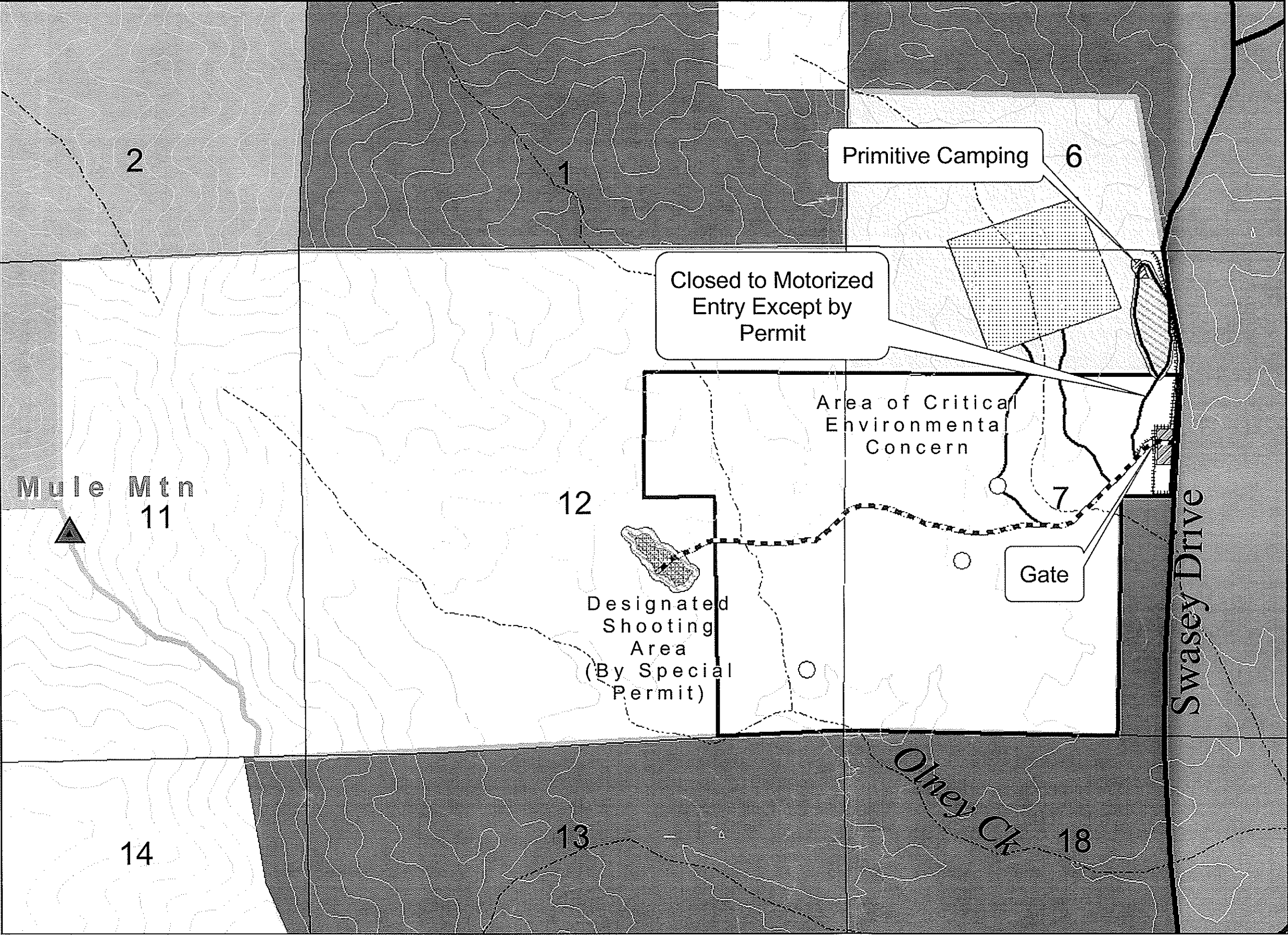
Public interpretation signing may be placed at the Boswell Mine, Tanya Site, and along the Clear Creek Ditch. The Boswell Mine area will be cleaned of modern trash and selectively cleared of vegetation for interpretation purposes. Small segments of the Clear Creek Ditch will be cleared of vegetation and restored for non motorized access (except motorized wheelchair-like vehicles) with at least one short segment handicap accessible. A primitive group campground may be established opposite the Straight Arrow Bowhunters, Inc. property along Swasey Drive. Hunting throughout the planning area will remain open and non hunting recreational shooting will be prohibited away from the shooting area.

Placement of bee hives at select, designated road-accessible locations away from the shooting area will be allowed (two locations maximum) provided they do not present a public nuisance to recreation-oriented visitors.

Rationale for Non Selection: This alternative is not considered optimal because the reality of management and law enforcement limitations caused by current and expected funding and other competing management activities and work priorities for staffing. It also places heavy restrictions on public use that under current land-use expectations may be excessive. Human safety will remain an issue even with the shooting range limitations, and closure of the area to motorized vehicles will preclude or limit some legitimate activities.

ALTERNATIVE 3
SWASEY DRIVE PLANNING AREA

Figure 5



CHAPTER 3--AFFECTED ENVIRONMENT

Historic Resources/Background: It is possible that Euroamerican visits to the study area began with the early 19th century trappers, although there is no local evidence for this. The influences of Pierson B. Reading's Mexican Land Grant activities are possible in this vicinity, especially early livestock grazing, beginning about 1844. Reading's discovery in 1848 of gold on nearby Clear Creek precipitated rapid Anglo-American buildup in the foothills of western Shasta County with numerous "boom" towns developing including nearby Centerville and Middletown. Olney Creek itself was named after Nathan Olney, an Oregon miner who mined the creek with his Walla Walla Indians in 1848. Shasta emerged as the primary mining center locally, although numerous small mining operations, cabin locations, trails, and roads from this major mining period occur throughout western Shasta County. These miners displaced the Wintu living in the ore-bearing zones like at Swasey. The Wintu people themselves were severely decimated by disease, killing, and mistreatment.

Local gold mining activities began with simple placer mining actions by individuals and small groups of miners. The pick, shovel and pan were first employed and the Spanish *arrastra* was used to crush ore, one such device and associated cabin ruins being found in the planning area. With the knowledge that continued success in placer mining necessitated the efficient use of water, many miners joined in corporate ventures to divert water to mining operations through a system of dams, ditches, and flumes. Among the most important mining ditches constructed in Shasta County was the 40+ mile-long Clear Creek Ditch. Built between 1853 and 1855, this National Register of Historic Places eligible ditch runs through the Swasey planning area. Such ditches served to provide year-round water to the mining operations.

By about 1860 lode mining in the area was conducted through corporate endeavors. The Boswell Mine in the study location is one such operation that continued through the Depression. The complex was owned by C.E. Boswell from the late 1800s into the 1900s. From 1893 to 1894 it was known as the Florida Mine, and operated as a quartz mine. The original claim measured 1500 feet by 600 feet and contained a 4-foot vein of gold-bearing quartz. Early improvements included two shafts and a 175' long tunnel. During the 1920s the Boswell Mine was known as the Florida Group, including 12 separate claims. The Big Gem, the most persistent gold producer of the group, was developed by shallow shafts. During the Depression developments included the construction of a 112-foot deep shaft, a 300-foot shaft, and a ten-stamp mill. Gold ore was processed here. The mine complex also included a cookhouse, boarding house for seasonal workers, family residence, and a machine shop. It was during the early 20th century that a number of individuals and families built small houses on their claims in the Swasey area, most eventually leaving as World War II ensued and the economy changed with limitations on gold mining operations.

Overall, the planning area is dense in historic remains of both Chinese and Euroamerican origin, including various mining features such as tailings, ditch segments, dams, mined areas, cabin locations, scattered artifacts, roads, trails, stacked rock walls, an *arrastra*, a millsite, claim markers, old stumps, fruit trees, etc. The 10 recorded historic sites in the planning area are listed in Appendix 1. Other unrecorded sites are known.

Native American Indian Resources/Background: Considerable ethnographic work has been conducted for northern California and the Redding region in general. However, the study area

has had no direct ethnological research and conclusions regarding the local Wintu inhabitants as they lived at the time of Euroamerican contact must rely on these broader studies. It is known that the Wintu worked in the local mines during the Depression (personal communication from Ed Grant, Wintu elder ca. 1985 to the BLM archaeologist [EWR]) and that during the early 20th century Euroamericans and Native American Indians of various regional tribes who had translocated to the local area lived within the planning area. It is also known that contemporary Wintu people consider the Swasey area significant to their culture.

Elaine Sundahl, a researcher for Shasta College, has completed an ethnographic summary for the planning area as part of a BLM-sponsored project. The Shasta College Archaeology lab report of 1998 by Sundahl titled *West Redding Archaeology Project: Excavations at CA-SHA-1991, Shasta County, California* is liberally paraphrased for this background summation.

At the time of Euroamerican contact the Wintu occupied the study area ranging from Cottonwood Creek to Lamoine and from Salt Creek to the upper Trinity River. Local names recorded in the 19th century for the Wintu included "Wylakers," and "Wailakki." Wintu is now the acceptable name. Early 20th century ethnographers divided the Wintu linguistically and culturally into eight geographic subareas. The *elpom* or Keswick subarea extended along the Sacramento River from the approximate location of Shasta Dam southward to Shasta. South of them was the *daunom* or Bald Hills Wintu. The *klabalpom* inhabited the general French Gulch area. Likely, considering the massive cultural disruptions brought by Euroamerican contact, such subareas are relatively recent. Sundahl, in the above reference, believes that prehistoric groups were organized on the basis of drainages. She notes that it is unclear whether the upper Olney Creek peoples belonged to groups living to the north, south or east, or were equally distinct from all other groups.

Social and political organization was focused on a principal village and secondary villages, a tribelet system. These allied residential sites were related to a loose territory, perhaps a portion of a watershed. Salmon and acorns were principal foods, especially for those living along the Sacramento River. Although an early observer in the region noted that the Wintu were indifferent hunters but good fishermen, based on occupants of riverine settings, regional variation on this dietary theme likely occurred. It is known that a diversity of plants and animals were consumed, probably dictated by local conditions and networks of interaction. These other foods include buckeye, hazel nuts, gray pine and sugar pine nuts, manzanita berries and many other kinds of bulbs, tubers, berries, seeds and leafy plants as well as rabbits, other small animals, insects (like grasshoppers), and fresh water mussels and gastropods. Many of these food sources, of course, exist or existed in the past in the study area.

The ethnographic record suggests the Wintu practiced a version of transhumance, seasonal movements highly related to the availability of food resources, between riverine villages and foothill locations, such as at Swasey. In this regard some of their technological devices, such as those used in hunting and fishing and food preparation, probably varied. The bow and arrow, quivers from otter or fisher, snares, nets, decoys, baskets, harpoon with bone toggle points, and fishing houses were present. Household implements included the hopper-mortar; cooking, storage and serving baskets; pestles of stone, hammer stones, various flaked stone tools, bone awls, and many other items.

Wintu oral history indicates these people were always here in the northern Sacramento Valley and surrounding hills. Linguistic studies (and archaeological evidence) suggest another scenario where the Wintu entered the area around 1200 to 1300 years ago. Both avenues of interpretation can be considered viable explanations for Wintu origins, a culture deeply rooted in mythology and oral history; in complex religious beliefs, beyond the scope of this document.

Prehistoric Cultural Resources: The Swasey area has been a key location toward furthering public knowledge about the prehistoric peoples of northern California. This development has been rather recent. The first formal field work was by BLM archaeologists in 1981 when one of the large village sites was recorded. In 1988 California State University, Chico undertook archaeology field class testing of this partially looted prehistoric village with the intention of determining the site's complexity and integrity. This work resulted in a report on file with BLM. During the late 1980s, Chico State also inventoried selected lands in the area for cultural resources. This work included extensive archival research and also resulted in a report filed with BLM. Subsequent surveys of portions of this planning area have been conducted by BLM archaeologists with reports on file with the agency. The archaeology-related Area of Critical Environmental Concern has been listed on the National Register of Historic Places. Important constituent sites were generally spared destruction by early mining activities below the main ditch systems and thus form a suite of past activity/living locations now rare in the Redding region.

Beginning in 1994 the field archaeology program of the Shasta-Trinity-Tehama Joint Community College District (Shasta College) conducted archaeological studies of local prehistoric sites. The studies focused on two major villages and have resulted in several archaeology reports published by the college. These studies and others from nearby areas provide for a model of prehistoric lifeways for the region with indications of at least 4000 years of local occupation.

While human occupation in the general region may go back at least 12,000 years, such evidence as yet has not been forthcoming from the planning area. The earliest evidence relates to a "middle" period that dates about 5000 B.P. to 1500 B.P. Tool kits became more elaborate from earlier periods with various distinguishable artifacts, including dart points and slab milling tools. Occupation within the western margins of the Sacramento Valley intensified during this period.

During the ensuing late prehistoric period hopper mortars, pestles and the bow and arrow were introduced, a period hypothesized by some scientists as coinciding with the introduction of Wintu ancestors into the region. Wintu oral history has their people occupying the area since time immemorial. The settlement pattern for this period consisted of the placement of large villages and smaller residential sites along secondary streams of the Sacramento River. Economic pursuits relied heavily on acorn gathering, deer hunting and salmon fishing. Large and small circular house structures together were the pattern and one large prehistoric house was partially excavated at the planning area's Tanya Site. Local research has substantiated a link between historic Wintu and the area's late prehistoric inhabitants including the discovery of prehistoric human burials in at least two of the sites.

With its well-preserved remains of villages, hunting camps/stone tool workstations, butchering sites, and a milling station; the Swasey planning area's contributing cultural resources comprise all or most of the ethnographically described Wintu settlement system. The planning area

includes a cluster of villages occurring within one drainage system—upper Olney Creek. This suite of prehistoric archaeological sites allows archaeologists the opportunity to examine economic, political, and social relationships among and within a native settlement system prior to the major Euroamerican incursion around 1848, as well as the opportunity to study the dynamics of a native settlement system over thousands of years.

The 20 recorded cultural resource properties in the planning area are listed in Appendix 1. Other unrecorded sites are known.

Geography, Geology and Soils: The rolling hills and low mountains in the planning area are moderately incised by numerous intermittent and seasonal drainages of the upper Olney Creek system, creating a varied topography ranging from nearly level terrain to steep (more than 50 percent gradient) slopes. Elevations in the planning area range from 880 feet to 2325 feet above sea level. Geologically, areas of Copley greenstone, Quaternary alluvium, and granitic outcrops of the Mule Mountain Stock underlay the planning area, which is part of the Klamath Mountain Province. Local soils are generally stony or rocky loam, sandy loam and sandy clay loam of the Auberry, Auburn, Diamond Springs, Goulding and Kanaka series. Higher slope soils are eroded.

Native Vegetation: The lower reaches of the study area are blue oak (*Quercus douglasii*) woodland with abundant grey pine (*Pinus sabiniana*) and poison oak (*Toxicodendron diversilobum*). As one heads west and up in elevation a manzanita (*Arctostaphylos viscida*)–Ceanothus chaparral community is reached with intermixed riparian (*Salix* sp., *Vitis californica*, *Rhamnus californica*) and grassland (*Avena* sp., *Bromus* sp., *Nassella pulchra*, etc.) habitats throughout both zones. At the highest elevations is a mixed, often dense zone of conifers (*Pinus ponderosa*, *Pinus attenuata*, *Calocedrus decurrens*), oaks (*Quercus wislizenii*, *Quercus kelloggii*) and chaparral (*Arctostaphylos* sp., *Ceanothus* sp., *Heteromeles arbutifolia*, *Aesculus californica*) species.

There are no known special status plant species in the study area based on extensive surveys on portions of the area and immediately surrounding public lands. The potential is considered low for occurrence due to survey information and lack of suitable habitat (e.g., elevation, rock and soil characteristics, moisture retention in soils, vernal pool presence, climatic conditions, etc.) and general location.

Weeds: In January 1999 an environmental assessment (RE-98-26) titled *Vegetation Management for Noxious Weed Control and Riparian Enhancement in Shasta, Tehama, Butte and Siskiyou Counties* was finalized and signed by the Redding Field Office manager. Vegetation management alternatives covered by this document include manual, mechanical, chemical, biological and fire-related. This document tiered to the BLM's California Vegetation Management FEIS from August 1988.

The EIS is a programmatic analysis, covering all BLM lands identified in the RMP to be retained in federal ownership. The BLM State Office requires a site specific Environmental Analysis to be completed for all actions. However, the programmatic Environmental Analysis covers all requirements of public notification, conformance with land use plans and various treatment alternatives. For chemical treatments, BLM must also submit a pesticide use proposal (PUP) to the BLM State Office before any chemical application.

The primary need for the Environmental Analysis is for the control of noxious exotic plants on the public lands that are displacing native plant species. For the Swasey planning area noxious exotic plants include yellow star thistle (*Centaurea solstitialis*), giant reed (*Arundo donax*), Chinese tree-of-heaven (*Ailanthus altissima*), Himalayan blackberry (*Rubus discolor*), and likely Scotch broom (*Cytisus scoparius*), Klamath weed (*Hypericum perforatum*), and Medusa-head (*Taeniantherum caput-medusae*).

Wildlife and Fisheries: The location hosts a variety of wildlife. Local fauna is typical of the foothills of the Sacramento Valley with deer, bear, gray foxes, coyotes, quail, turkey vultures, scrub jays, squirrels, rabbits, lizards, snakes, introduced turkeys, and other terrestrial wildlife moderately abundant. It is certain this upper reach of Olney Creek is sporadically used by salmonid fishes in its lower sections, but not in its upper sections. Fish and shellfish remains have been recovered from the adjoining prehistoric residential sites. Three dams downstream of the study area, one on public (partially removed in 2004) and two on private lands, likely impede migratory anadromous fish. It is also probable that the elevation rise above the lower reaches of this stream (east of Swasey Drive) impedes migration. Furthermore, oral history accounts (Charles Nachreiner through Ken Gifford, personal communication 2001) suggest that before heavy brush growth (early 20th century) Olney Creek in this vicinity flowed year round. Additionally, there have been other disturbances including the National Guard's construction within the planning parcels of a major road, target shooting area, and now breached earthen dam across Olney Creek (towards the southeastern portion of the study area).

There has also been periodic placer mining in the stream that together or separately may have proved detrimental to aquatic species. While the lower reaches of Olney Creek within the Valley proper have habitat and perennial water used by aquatic species, including federally protected anadromous species and fresh water turtles, the Department of Fish and Game does not consider upper Olney Creek at present a viable fishery (poor to marginal at best), primarily due to the hot summer conditions (personal communication to BLM Fisheries Biologist Brandt Gutermuth by Department of Fish and Game Fishery Biologist Terry Healy 2001). Fish attracted to these upper reaches out migrate prior to low flow conditions or perish when the stream dries during the late spring-early summer. No known threatened or endangered animal species are present in the planning area. However, BLM Sensitive Species, such as foothill yellow-legged frog, bat species, and terrestrial mollusk species may be found in the area.

Minerals: Mineral deposits in this area consist of scattered, small, steeply dipping, and low sulfide, gold-bearing quartz veins and the associated residual and alluvial surface placers. Past mining has consisted of underground and small-scale surface cut mines and prospects in the gold-bearing quartz veins and small scale surface placer mining of the gravel deposits. As in most other historic gold mining areas in northern California, mercury was used locally in the recovery of lode and placer gold.

BLM mining claim records indicate there has been 87 lode and 49 placer mining claims located on this land since 1979. Only one active claim exists today (June, 2004), the Vista Placer Claim located in T31N., R5W., SW 1/4 of Section 6. Absent a change in the current low price of gold, few new claims are expected in the near future (ca. next 10 years)

Existing Infrastructure: Fencing, generally barbed wire varieties, are scattered around

the parcel marking private land boundaries or archaeological protection locations. The main road that runs east-west through the parcel between Swasey Drive, a paved road, and the primary shooting area, is an improved dirt road. BLM provides periodic (every two to three years) road maintenance on this track, usually involving a grader. There are five culverts that exist along this road, generally composed of metal casings placed by the National Guard. These are maintained as needed. A wooden informational kiosk is located near the parcel's main access road entrance just as one leaves Swasey Drive.

Existing Rights-of-Way – Authorizations: The existing realty-based authorizations within the planning area include a Pacific Gas and Electric Company power transmission line near the eastern edge, a cablevision line, also near the eastern edge along Swasey Drive, and an apiary permit.

Recreation: The major recreation activities occurring within the Swasey Drive planning area consist of target shooting, hunting, hiking, horseback riding, mountain biking, wildlife viewing, and off-highway vehicle (OHV) use. Other less frequent activities include: Parking for commercial events related to recreation use, camping, ethnic ceremonies, running, dog training, and firearms training under special recreation use permit authorization. There are no accurate visitor use statistics but it is estimated that the planning area receives approximately 4000-5000 visitor days per year or more (one visitor day = one visit by one person for any time period during a single day.)

Special regulations for certain recreation activities have been implemented for camping, target shooting and OHV use. The OHV designation for the Swasey planning area is "limited to designated roads and trails." This allows motorized vehicles to use only the main access road leading to the shooting area and three spurs that branch off the main access road. Two of the spurs access private property within the planning area. The third spur allows access to a camping and parking area along Swasey Drive (see Figure 3).

Target shooting is restricted to the old National Guard shooting range. Hunting is allowed in accordance with State game laws.

Camping is allowed but restricted to 14 days per calendar year.

Currently, there are no designated non-motorized trails such as hiking, equestrian and mountain bike trails. However, construction of one major east-west trail (Mule Mtn. or Wintu Trail) has been nearly completed in 2004. Numerous already informally linked abandoned or little-used trails occur throughout the planning area and several have recently (2002-2004) been cleared for informal use. The major new constructed trail is planned to be linked with the City of Redding's Westside Trail network and the Whiskeytown National Recreation Area non motorized trails' system. Non-motorized recreation trail use is growing in the region.

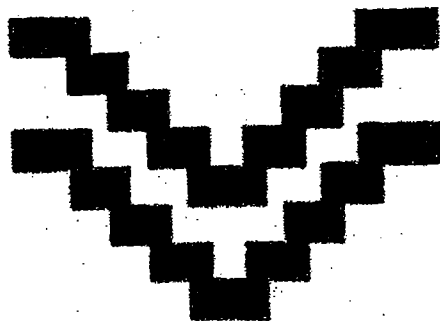
Visual Resource Management: Visual resource management prescriptions have not been applied to the Swasey planning area. It is the intention of this planning effort not to noticeably change the visual character of the planning area setting. More likely, the visual setting within the planning area will improve.

Hazardous Waste: Lead within the Shooting Area: Because of concerns for hazardous materials within the planning area, particularly those that might be associated with the areas of concentrated shooting exercises and mining activities, sediment samples were obtained from select locations and submitted to Columbia Analytical Services of Redding for analysis of various metals and compounds (cations), particularly lead, mercury and arsenic (see Appendix 4). Five samples were obtained by BLM following guidance from Columbia Analytical Services and hazardous waste specialists with BLM. The samples were obtained in September 2001.

The five samples of soil/sediment were obtained within the study parcel from (1) upper Olney Creek above the shooting area (UTM NAD27 0543249e, 4489120n); (2) a small gully within the center of the principal shooting area (UTM 0543064e, 4488899n); (3) one of the principal banks of shooting (UTM 0543093e, 4488846n); (4) within a secondary drainage of Olney Creek several hundred feet below the principal shooting area (UTM 0543186e, 4488811n); and (5) from Olney Creek within approximately one-quarter mile of the main shooting area (UTM 0543623e, 4488415n). Utilizing State of California (CA Title 22) Total Threshold Limit Concentration (TTLIC) values (see Appendix 4), the only value that exceeded State standards was lead within Sample 3, the target bank within the main shooting area. Immediately downstream within Sample 4 (sediments above but not on bedrock) lead is elevated but below State thresholds. This suggests there is a rather immediate drop-off in lead values (over ten fold) within the small secondary drainage leading from the main shooting area with negligible lead apparent in the sample even further downstream.

Fire and Fuels Management: Threats from wildland fire are increasing every year in the planning area due to continuing fire suppression in the area, increasing hazardous fuel buildup, and a growing wildland-urban interface. Fuels management is an important planning component with safety and a sound ecological setting the prime concerns.

Shaded fuel breaks have been constructed on predominant ridges and road corridors within the planning area and the immediate environs over the last 20 years. These projects were completed in cooperation with public and private adjacent landowners. Shaded fuel breaks are created to help break up the continuity of existing thick brush vegetation and provide strategic access points for fire suppression operations during wildland fires. Fuel breaks often help slow down or alter wildland fire spread and reduce impacts to existing vegetation, particularly the forest canopy within fuel break areas.



Wintu basket design

CHAPTER 4--ENVIRONMENTAL CONSEQUENCES OF THE PROPOSED PLAN AND ALTERNATIVES

Critical Elements of the Human Environment:

The following table summarizes potential impacts to various elements of the human environment, including the "critical elements" listed in BLM Manual H-1790-1, Appendix 5, as amended. Elements for which there are no effects will not be discussed further in this document.

Environmental Element	Proposed Action		No Action Alternative		Specialist Init.
	Affected	No Effect	Affected	No Effect	
Air Quality*		✓		✓	W.H
ACECs		✓		✓	SRM
Cultural Resources		✓	✓		EWR
Native Amer. Religious Concerns		✓		✓	EWR
Environmental Justice*		✓		✓	EWR
Farm Lands*		✓		✓	JGM
Floodplains*		✓		✓	SRM
T&E Animal species		✓		✓	H.
T&E Plant species		✓		✓	JGM
Wastes (hazardous/solid)		✓		✓	SRM
Water Quality		✓		✓	SRM
Wetlands/Riparian Zones		✓		✓	H.
Wild and Scenic Rivers*		✓		✓	C. J.
Wilderness*		✓		✓	C. J.
Invasive, Nonnative Species		✓		✓	JGM

*not applicable

No Action—Continuation of Existing Management

Cultural Resources: Cultural resources will continue to be managed on a makeshift basis with a focus that could continue to create impacts and little proactive management. Cultural resources will not receive the management and public spotlight they deserve because of their significance with the potential for less attention and necessary protection and stewardship. At least one site per year is expected to experience some level of damage.

Firearms Use: A long-term focus on concentrated and dispersed firearm use has, and will continue to create safety problems and concerns and incompatibilities with other recreation uses, especially with regard to the existing target shooting area. There will continue to be at least 25 citable offenses related to gun use in the area each year and arguably it is possible at least one stray bullet will find its way into the nearby residential complex every year or two based on previous complaints. At least 50 individuals such as trail users may feel threatened or alarmed by gunfire noise each year. The firing range presents a high percentage of “blue sky” where bullets directly or through ricochet could travel to populated areas.

Human Health and Safety: Fire and Fuel Management practices will enhance watershed/soil protection, animal habitat, and public safety if executed appropriately through subsequent planning, public contact, multiple agency coordination, follow-up environmental analysis, and care. We expect to prevent widespread watershed and possible structure damage at a rate of approximately one incident per 5-10 years in all alternatives (Appendix 5).

Without clean-up of lead in the gun range there is a possibility of lead contamination in Olney Creek (and its biotic system) and to visitors, especially with continued use over a protected period of time.

Motorized Vehicle Use/Accelerated Soil Erosion: Illegal OHV use will continue despite periodic law enforcement presence, signing and barricading. This has been a major cause of existing off-road surface damage at a rate of ca. 1 acre per year leading to unacceptable erosion.

Land Tenure Decisions: The RMP intention is for disposal of Public Land in Section 6 and the north 1/2 of the north 1/2 of Section 7. This will potentially lead to watershed and habitat degradation, infringement on the ACEC by developments through visual and auditory intrusions, illegal vehicle entry, limitations on non-motorized recreation trail development, and increased control costs. Disposal will lessen a protective buffer around cultural resources, provide a loss of other recreation opportunities, and possibly place undue limitations on federally approved small-scale mining opportunities.

Disposal will lessen the greenbelt corridor that now exists between urban sprawl to the north and south. Additionally, disposal will potentially lead to more safety concerns because of BLM designated shooting area-related intrusions such as noise and errant bullets on new housing or other developments.

Without acquisition of the private in-holding there is the possibility that legal access concerns to and from this parcel will continue, especially with respect to motorized vehicles. Activities within the private parcel may increase sediment and toxic material flow into Olney Creek. There

is a possibility of intrusions of public land visitors into the private holding creating trespass problems. Managing the in-holding boundaries with signing and fencing may be costly. The presence of an in-holding can restrict various management activities suited to a block of federal lands such as fire management, watershed protection through vegetation manipulation, and control of noxious weeds. Acquisition provides a consistent greenbelt corridor. Acquiring the parcel may prove costly. A plan amendment will need to be written and approved prior to acquisition.

Alternative 1: Proposed Action (Resource Protection Emphasis and Selected Recreation Uses)

This is the preferred alternative. It emphasizes protection of cultural and natural resources while providing compatible, generally passive recreation opportunities.

Cultural Resource Management: This alternative will provide important cultural resource site protection measures while encouraging select site interpretation and research. Impacts to cultural resources will be less than exists with current conditions (less than one incident per year).

Firearm use within a confined range will be phased out after four years with limitations on type of firearm use (shotguns only) and special permitted shooting (hunter's safety courses, concealed weapons training, law enforcement use) allowing users to find alternative locations away from the Swasey study area within a reasonable timeframe lessening the impacts on this form of recreation. Overall, thousands of visitor days devoted to this activity will be curtailed each year and this alternative will have a definite impact on local firearm-related activities.

Human Health and Safety will be enhanced through increased designated shooting area controls and eventual closure of the designated shooting area. Conflicts (safety, noise, insecurities, etc.) between home owners nearby and other recreationists and those using the range will decrease. Within the first year or two after closure there may be an increase in enforcement costs but fewer errant bullet incidents.

Fire and Fuels Management practices will enhance watershed/soil protection, animal habitat, and public safety if executed appropriately through subsequent planning, public contact, multiple agency coordination, follow-up environmental analysis, and attention following the National Fire Plan and the 10-year Comprehensive Strategy (Appendix 5).

Motorized Vehicle Use will be curtailed in this alternative and this form of recreation activity diminished by hundreds of person days per year providing fewer potential impacts to archaeological sites, soils and watershed and confrontations with more passive recreationists. Illegal nighttime activities will also be limited thereby easing management costs (hundred to thousands of dollars per year) for law enforcement, trash cleanup and resource damage repair.

Accelerated Soil Erosion (and watershed damage) will be lessened with this alternative since there will be less motorized vehicle use and OHV damage away from roads, probably in the realm of 10 or less cubic yards per year decrease in sedimentation.

Land Tenure Adjustments: Retention of public lands scheduled for disposal will

prevent archery club expansion to the west. On the other hand, retention will allow more efficient management of the watershed, greenbelt, and various natural and cultural resources; prevent or lessen visual and auditory intrusions and trespass, and form a protective landscape buffer for archaeological sites and various recreationists, including trail enthusiasts.

Acquisition of the private in-holding, seller willing and funds/workforce commitments made available (following the RMP amendment requirement), will provide landscape management continuity of a major watershed, potentially lessen trespass and ingress/egress problems to the parcel, possibly facilitate sediment and toxic substance reduction in a branch of Olney Creek, and allow a broader application of recreation opportunities. Also, such acquisition may reduce visual and auditory intrusions to recreationists on the adjoining public lands.

Other Recreation Uses: An increase in non-motorized recreation trail use will result from this alternative. This will benefit users of this type of development with minimal impacts expected to resources such as archaeological sites, soils, riparian vegetation, watershed and other recreational pursuits with the possible exception of encounters with hunters who will also benefit from trail construction. There may also be minor tread damage to historic ditches offset by clearing and historic interpretation.

Alternative 2 (Public Recreation Emphasis)

Cultural Resources: Increased visitation invites potential archaeological impacts from vandals and looters (one or more incidents per year) and potential OHV intrusions (possibly in the scores) despite barricading and signing. Public archaeological and historical site interpretation/education will be enhanced, although such work will necessitate expenditures (hundreds to thousands of dollars per year) that might take away some focus from other important locations needing cultural interpretation.

Firearms Use: The alternative raises safety and liability concerns from the presence of a formal or semi-formal firearm shooting range and close proximity to housing and Grant School (Figure 6). There is an indirect effect of casual shooters operating away from the range illegally endangering nearby residents and possibly students with errant bullets (BLM has several reports on file). There is also the consideration of shooting noise nuisance to nearby residents.

Human Health and Safety: Aside from issues stated above with regard to firearm use, well-regulated fire and fuels management activities will decrease the endangerment of habitat and residential/life loss due to fires as discussed under Alternative 1 and in Appendix 5.

Motorized Vehicle Use/Accelerated Soil Erosion: There will remain the high possibility of illegal off-road motorized vehicle use with this alternative, although less than under the existing situation due to barricading and signing. Under this alternative it is projected that soil/sediment loss will be less than 10 cubic yards per year from surface damage from motorized vehicle use away from designated routes.

Land Tenure Decisions: Retention of public lands scheduled for disposal will prevent Straight Arrow Bowhunters, Inc. expansion. On the other hand, retention will allow more efficient management of the watershed, greenbelt, and various natural and cultural resources; prevent or

lessen visual and auditory intrusions and trespass, provide a broader recreation base for multiple uses, and form a protective landscape buffer for archaeological sites and various recreation users, including trail enthusiasts. Swasey Drive provides a manageable boundary to the area as well.

Acquisition of the private in-holding (following approval of a plan amendment), seller willing and funds/workforce commitments made available, will provide landscape management continuity of a major watershed, potentially lessen trespass and ingress/egress problems to the parcel, possibly facilitate sediment and toxic substance reduction in a branch of Olney Creek, and allow a broader application of recreation opportunities. Also, such acquisition may reduce visual and noise intrusions to recreationists on the adjoining public lands.

Other Recreation Uses: Construction of a primitive campground in the proposed disposal area will be convenient for Straight Arrow Bowhunters, Inc. users and others offering another facility for recreational use. However, such a facility will only serve a small number of participants in the large events. Furthermore, this facility, if developed, could take away human resources and money from other facilities and focus areas and potentially form an administrative headache.

Allowance of expanded Straight Arrow Bowhunters, Inc. shoot opportunities on a periodic basis will enrich this form of recreational experience, although such use may temporarily restrict other recreation-based uses and may tax administrative and law enforcement capabilities.

This alternative will allow an increase in primitive trail use. There could be possible conflicts with designated shooting area users, especially in terms of perceived safety considerations (errant bullets) and periodic noise "pollution" from shooting, alarming trail users and their animals, if accompanying, such as horses.

The potential for indirect impacts to natural resources from perceived heavy visitor use and overflow exists with this alternative. Trail use, for instance, will have to be monitored for excess soil damage and erosion, although expected impacts are perceived as minimal.

Alternative 3 - Mixed Public Use and Resource Protection Emphasis

Cultural Resources: Archaeological site protection will likely be enhanced due to limitations on vehicle/visitor access and a focus on interpretation. However, vehicle closure will also prevent informal monitoring of some of the sites by certain visitors who use motorized vehicles on the designated roads. More non-motorized trail use could lead to visitors damaging cultural resources since there will likely be an increase in dispersed recreation use and site encounters. This is especially true at secluded sites where there may be a temptation to collect artifacts.

Firearm Use/Human Health and Safety. Firearm use will remain an issue even with exact target shooting area restrictions since there is still the possibility of errant bullets from a formalized range and focused shooting. Lead may contaminate Olney Creek through continued use. Lead in the gun range may pose a safety hazard to users, especially from airborne lead particulate matter.

Closure to Motorized Vehicle Use will preclude some recreation play (perhaps 50% less as an intuitive estimate) compared to existing conditions.

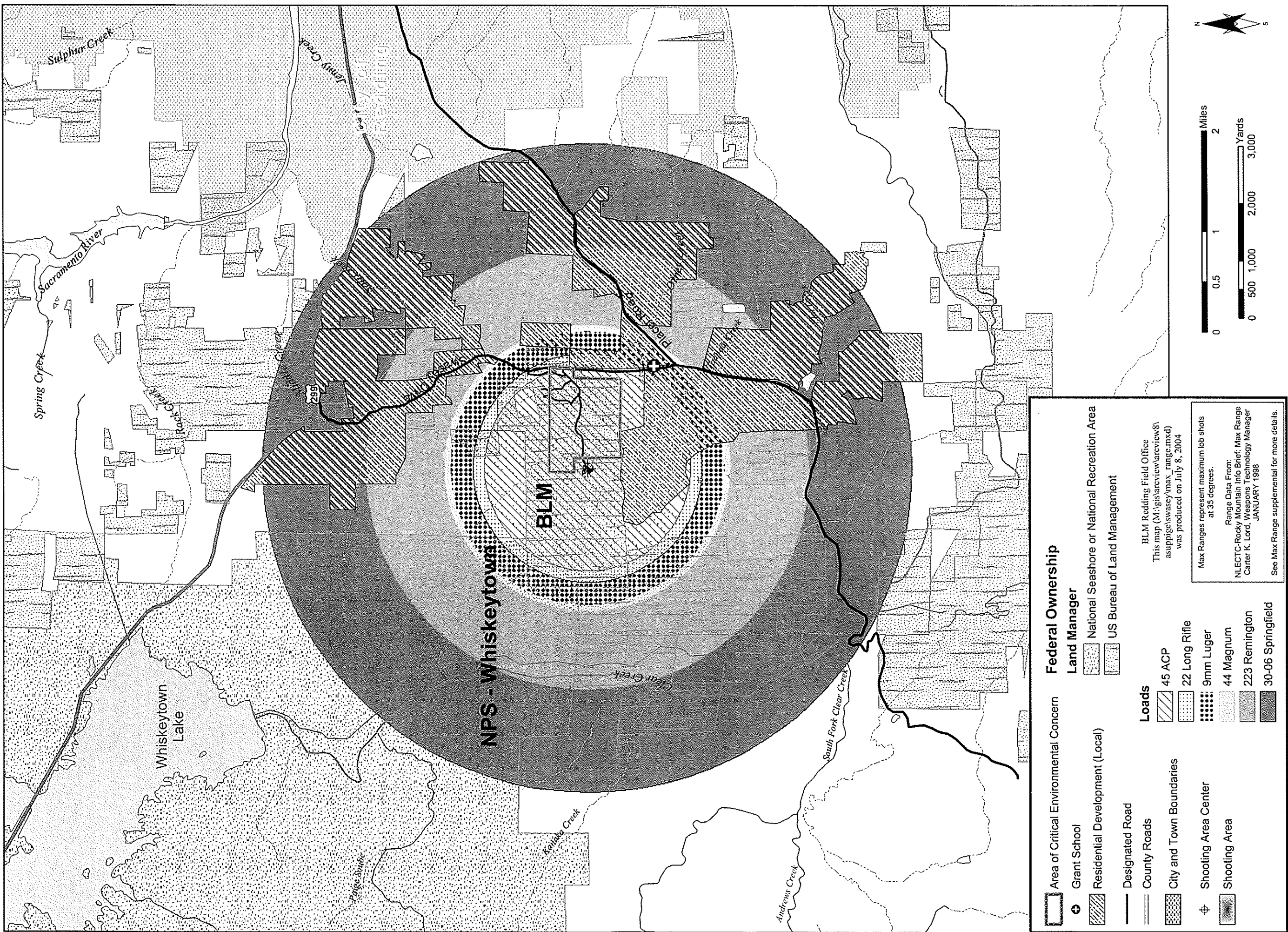
Accelerated Soil Erosion will likely lessen and watershed protection will be enhanced with this alternative. This is especially so with respect to erosion that will result from motorized vehicle use away from designated routes. Possibly 5-10 cubic yards of soil/sediment loss may be prevented.

Fire and Fuels Management (see Alternative 1 discussion)

Land Tenure Adjustment: (see Alternative 1 discussion)

Non-motorized Recreation Trail Construction will likely be enhanced in this alternative with increased recreational activities (hundreds of visitors per year) related to this use.

Range of Various Ammunition Loads from Center of Swasey Shooting Area



CHAPTER 5—CUMULATIVE EFFECTS AND IRREVERSIBLE AND IRRETRIEVABLE COMMITMENT OF RESOURCES

The following actions will be conducted no matter which alternative is implemented. All of these actions are beneficial to good land stewardship and have positive cumulative effects.

- Archaeological sites and natural resources will be protected on a case by case basis.
- Law enforcement patrols will continue with a higher anticipated efficiency because of improved facility development and greater management focus.
- Trash clean-up will continue.
- Public safety will continue to be a management priority. Risks to the public are judged to be higher under the no-action alternative.
- Existing rights-of-way will be maintained and limited to the ACEC/study area east edge as presently in place.
- Environmental education and resource stewardship will be encouraged.
- Fuel reduction and fire prevention actions will create a low level of risk to structures and life from fuel reduction activities and potential runaway pile-burning fires. The benefits outweigh the potential risks. The no action alternative will lead to a continuance in vegetation community decadence with less vegetation mix and less animal habitat diversity.
- Closure of the area to camping except under Special Recreation Use Permit will lessen this recreation experience by 500 or less visitor days per year. The result will be less trash disposal and fire danger.
- Well-regulated commercial mining will be focused away from sensitive resources but could conceivably still leave scarring. The likelihood of mining is considered too low (one proposed action per 5-10 years) to be a major management concern.
- Any ground-disturbing activities will be kept at least 100 foot away from the principal reaches of Olney Creek.
- Surveys for federally protected salmonid species, foothill yellow-legged frog (BLM Sensitive Species), terrestrial mollusk species (BLM SS), bat species (BLM SS), archaeological sites and federally protected plants will be conducted as part of the environmental analysis before any ground disturbing activities. Avoidance of impacts will be the principal action in all cases.

Under the **No Action—Continuation of Existing Management** option, resources will continue to be managed on an ad hoc basis with potential increased costs to the taxpayer.

- Continuation of long-term existing target shooting area use, while possibly controlled by private sector interests through adoption of the “range” by a user group, will still pose potential

threats to non-shooting users such as bikers, horseback riders, nearby homeowners and the like through wayward bullets or “mavericks” who would like to shoot away from the existing target shooting area. Some visitors and nearby homeowners will continue to be alarmed or disturbed by gunfire noise. Furthermore, since safety risks may continue at an unacceptable level, closing the area for this reason only will be limiting to other recreationists and visitors.

➤ If off highway vehicle riders cannot effectively be kept on designated routes, the area could be closed to public vehicular access. About 1000 visitor days of this type of recreational use will be lost if the area was closed.

➤ Newly developed hiking/biking/horseback riding trails--where they come close to the existing shooting area--pose a potential use conflict if shooters disregard safe backgrounds. There is also the perception through gunfire noise that there could be stray bullets that could cause injury or death thereby lessening the hiking/biking/horseback riding experience.

➤ A formalized management plan and schedule will be cost efficient and beneficial to the cultural and natural resource base since it sets up a series of actions that can be tracked and budgeted and interrelated to safe multiple resource use.

Proposed Action (Alternative 1): Implementation of the proposed action will require no irreversible or irretrievable commitment of resources. The land is managed principally for the conservation and protection of cultural and environmental resources with passive recreation activities predominant.

➤ The impacts to cultural and ecological resources overall will be quite positive since these various assets will be aggressively protected, studied and interpreted for the public's benefit. Minor professional archaeological excavation impacts will be offset by information recovery and interpretation.

➤ Nighttime closure will lessen illegal activities such as dumping, random shooting, teenage partying, drug use, and fire danger from illegal campfires. Limitations on recreational uses will be minimal.

➤ Remediation of the existing target shooting area will lessen hazardous waste in the area, especially lead.

Under **Alternative 2**, the public recreation option, increased visitor use could create conflicts with resource protection.

➤ Illegal off road vehicle use will be further curtailed resulting in hundreds of square yards or less surface soil disturbance based on past damage and intuitive estimates.

➤ Shooting area restrictions and adoption will lessen current safety concerns. However, as discussed under the existing management alternative, there will continue to be some safety anxieties and tension among non-shooting recreationists who could hear the gunfire and possibly misunderstand the firing direction, even if well-controlled.

➤ Generally with more recreation there is a greater likelihood of intentional or unintentional damage to cultural resources through digging, casual collecting, rummaging through features such as chimney/cabin foundations and arrastras, driving over sites, etc. On the other hand, more visitors undertaking passive recreational pursuits can sometimes provide eyes and ears for BLM by watching over sites. Overall, there will probably be no more than one negative incident per year.

➤ Increase in visitation by the public raises the possibility of accidental fire and damage to resources and neighbors.

With the adoption of **Alternative 3**, heavy restrictions will be placed on visitor use and demanding management and budgetary commitments that will be difficult to balance with other obligations in other areas.

➤ Closure of the location to OHV use except under permit will likely lessen this recreation experience by several thousand or more visitor days per year. On the other hand, the likelihood of OHV damage to soils and archaeological sites will be lessened by a surface acre or less per year in terms of soil/sediment displacement and less than one illegal heritage-damaging incident per year.

➤ Restrictions on the existing target shooting area use will lessen this recreational experience by several thousand visitor days or more per year.

CHAPTER 6—COORDINATION AND CONSULTATION

The following agencies, tribes and groups were contacted regarding the plan/EA. Individual names are not included unless they are public figures.

Black Sheep 4x4 club
Blue Ribbon Coalition
Bureau of Indian Affairs
California Association of 4WD Clubs, Inc.
California Council of Tribal Governments
California Department of Fish and Game
California Department of Parks and Recreation
California Department of Toxic Substances Control
California Off Road Vehicle Association
California Rifle and Pistol Association
California State Office of Historic Preservation
California Wilderness Coalition
Centerville Water District
Coyote and Fox Enterprises
Environmental Protection Agency
Grant School
Honorable Barbara Boxer
Honorable Dianne Feinstein
Honorable Douglas LaMalfa
Honorable Gray Davis
Honorable Samuel Aanestad
Honorable Wally Herger
Jones Fort
Marks Cablevision
Mt. Shasta Long Rifles
National Rifle Association
Northern California County Supervisors Association
Park Apiaries, Inc.
Parks and Preserves Foundation
PG&E
Redding Dirt Riders
Redding Rancheria
Resources Agency
Shasta Community Services District
Shasta County Board of Supervisors
Shasta County Department of Resource Management
Shasta County Planning Department
Shasta County Sheriff's Department
Shasta Historical Society
Shasta Miners and Prospectors Assoc.
Shasta Rock Rollers ATV Club
Shasta-Trinity National Forest
Sierra Club

Straight Arrow Bowhunters, Inc.
Trinity County Board of Supervisors
U.S. Fish and Wildlife Service
Whiskeytown Shasta Trinity national Recreation Area (NPS)
Wintu Cultural and Educational Council
Wintu Tribe and Toyon-Wintu Center

Consultation with U.S. Fish and Wildlife Service and NOAA Fisheries for compliance with the Endangered Species and other regulatory requirements:

The Swasey Plan has no actions affecting proposed or listed federally protected species under the Endangered Species Act; therefore consultation is not required for wildlife or fisheries species. If proposed projects may have an affect on federally listed species, consultation with FWS or NOAA Fisheries will ensure protection and conservation of those listed species.

CHAPTER 7----PUBLIC PARTICIPATION AND RESPONSE

Public Participation: As part of the initial scoping for this assessment, in May of 2001 the public, tribes and various government offices were notified of this land use plan endeavor. They were invited to participate by identifying planning issues. The mailing list included individuals who had asked to be contacted regarding BLM business, neighbors to the planning area, and numerous groups and agencies that were thought to potentially have an interest.

The Scoping Document for the Swasey Area Implementation Plan and Environmental Analysis Record announcement was posted on BLM's web site and a request for input from the public was posted at the Redding BLM office front counter in Redding. Also, a notice of the planning effort and issue identification process and study area map were posted on the BLM kiosk at the main entrance to the Swasey Drive planning area.

Eleven formal responses were received as a result of the Scoping Document solicitation. Seven of the responses were from individuals; two were from groups (Straight Arrow Bowhunters, Inc. and North State Health Improvement Network), and two were from Shasta County (Department of Resource Management and Office of the Sheriff).

The responses generally support the issues raised internally by BLM staff and the multiple use concept. Various responses were both for and against use of the designated shooting area (and shooting in general) and pro and con regarding motorized vehicle use in the area. One commenter requested boundary adjustments to the public land base. Public access and safety was clearly an issue along with public interest in increased law enforcement. Wildfire control considerations were strongly expressed and a general concern was conveyed that BLM not conduct controlled burns. Among the many topics raised in the letters was an advocacy for more non motorized recreation/nature trails, including those for mobility impaired individuals; interpretation; erosion control and habitat/watershed improvement; upgraded signing; and consideration of trespass problems. Support was unanimous for cultural resource protection.

The public comment process on planning/Environmental Analysis documents enables participation by the public and governmental parties to make facts and feelings known to the decision makers. It is not a voting process and is used to assist in the formation of the land use decision by helping to ensure that all important factors are being considered.

A Draft Plan and Environmental Assessment was prepared and posted to the Redding Field Office web site on November 3, 2003 concurrent with the mail out of the draft plan/environmental assessment hard copy. There was also a news release regarding its availability sent to local newspapers and radio and television stations. The plan/EA was mailed out to over 150 individuals, groups, tribes and governmental agencies. Copies were available and distributed to individuals who requested one through an office visit and other copies were distributed at a public meeting held November 19, 2003. A copy was also provided to the Shasta County Library with a posting of its availability for review. Availability notices were posted on the kiosks near the entrance to Swasey Drive and near the community mailboxes of the adjoining subdivision. A news article and follow up editorial regarding the plan were published in the *Redding Record Searchlight* on November 16 and 18, 2003. Notice of the plan's availability was

included. Approximately 200 copies of the draft document were distributed. The comment period ended December 8, 2003.

BLM held the November 2003 public meeting at their Redding office to explain the draft plan and environmental analysis, to answer public questions and to receive comments. Approximately 65 individuals attended. BLM staff recorded the questions and comments on flip charts. There were 24 questions posed and 36 comments offered. These have been presented in Appendix 6, including the answers provided at the meeting to the questions.

The questions asked can be separated into those related to shooting/safety (11), other recreation (5), land tenure adjustment (4), public access (2), law enforcement (1) and heritage resources (1).

In addition to those comments and questions orally presented at the public meeting there were five written comments provided to BLM during the meeting. Subsequently, another 18 letters and e-mails were received from the public and public agencies. Each of these items of correspondence is addressed below followed by responses to the public meeting questions:

#1 Comments from an individual regarding parcel adjustment for Straight Arrow Bowhunters, Inc. with an offer to fence and gate new boundary, provide cleanup, limit encroachment, possibly lessen maintenance, and provide monitoring.

Response: Proposed boundary adjustment could limit multiple uses by focusing use down to several activities and impact upper Olney Creek watershed management where federal remedial actions could be limited. This proposal will provide less open space for the general public, will create an interior boundary that could be less effective than a fenced boundary along Swasey Drive, and will not be consistent with a trailhead facility proposed. The Club could undertake select uses (e.g., shooting, parking, camping, etc.) under BLM permit without ownership. The Club could also serve as area monitors. Acquisition by the Club could lessen the protective buffer surrounding the National Register of Historic Places District and might even include a portion of this District inconsistent with protective management and limited use.

#2 Favors Alternative 1. Recommends limits on direction of fire from shooting area to be consistent with trail use and parking at range for trail access. Supports a volunteer program for archaeological work participation. Suggests BLM list priorities and their weighting factors in the issues section.

Response: Signing has been posted to direct trail users around the shooting area to prevent accidents. Signing has also been posted to direct safe shooting direction at the shooting area. Volunteers wishing to participate in archaeological work should contact the Field Office archaeologist regarding projects. Some discussion was presented regarding issue priorities. Among the primary issues, human health and safety always come first. The designation of the core area as an Area of Critical Environmental Concern with regard to archaeological resources is clearly second in importance. Firearm use has received the most public input and, while tied to some extent to human health and safety where it is the main planning concern, this is another highly rated issue. The other issues highlighted (motorized vehicle use and accelerated soil erosion) are of similar importance but less than the above discussed issues.

#3. Respondent is against closure of shooting area and off-road use closure because such convenient use areas are limited regionally. Would like to see a replacement area immediately available if use is curtailed.

Response: Human and health and safety are the primary concern with management of a shooting area. This issue has been raised by the public, including neighboring home owners. BLM does not wish to be held liable for accidents resulting from promotion of concentrated shooting without costly safeguards and on-site oversight. No one has stepped forward to offer assistance in this regard despite BLM outreach. There is also the issue of continual garbage clean-up and bullet-laced sign replacement from irresponsible shooters and visitors to the shooting area. Furthermore, there are continued law-enforcement costs with the shooting area disproportionate to many other areas of needed scrutiny. OHV use will remain approximately the same provided impacts do not exceed established thresholds of resource damage discussed in the draft plan. There are many areas of accessible public land currently opened to shooting, and there are challenging OHV use zones in the Redding region.

#4. Commenter believes blocking OHV use in area will lead to illegal off-road riding in other areas.

Response: See response to #3

#5. Request to be placed on mailing list.

#6. Respondent questions access to his mining claim.

Response: Claimant will be allowed access to his claim on existing roads provided he has access through private in holding. Otherwise access will have to be developed consistent with 43 CFR 3809 mining regulations.

#7. Supports Alternative 1. Proposes closing north-south open roads due to OHV-caused resource damage with rehabilitation of these areas.

Response: Limitations on road use where resource damage has occurred is being implemented. Continued use beyond the threshold indicated in the plan will lead to total motorized vehicle closure of the area. Damaged areas are being rehabilitated.

#8 Supports gun range closure.

#9. Notes nighttime shooting in area and shooting directed at the respondent. Notes incidents of random bullets hitting houses adjoining the planning area. Wishes to see a horse park developed.

Response: Preferred alternative is in response to human health and safety related to shooting incidents. BLM, based on other priorities, does not have the resources to devote to the development of a formal horse park in this locality.

#10 Advocates free shooting area as opposed to fee ranges and recommends Iron Mountain Road area. Recommends no closure of shooting area at Swasey until another free range is made

available. Recommends nighttime closure and closure of ATV access. Prefers camping by permit only.

Response: Iron Mountain Road is currently open to free shooting as are many other parcels of public land in the Redding area. Other recommendations follow the preferred alternative.

#11 Proposes a gate to close off entrance to planning area with daytime use only. Other concerns include lead contamination at the gun range, firearm discharge away from shooting area, dust from vehicles, soil damage from vehicles and speeding on access road with accident potential. Favors shooting area phase-out. Wishes to see proposed parking lot with lighting moved from their house vicinity. Desires sale of land on north side of their property or granting them an easement between original proposed parking lot and their property. Opposes disposal of land to other private parties as considered in the draft plan.

Response: The decision is to have a nighttime closure. If daytime damages become excessive or dangerous then the area can be closed to vehicular entry entirely. Lead contamination within the shooting area is a concern and will be addressed. Shooting is restricted to the firing range except for hunters and signs have been posted and rangers patrol the area periodically. The vehicle speeding issue is being addressed and signing and enforcement are planned. The proposed parking area has been moved to a trailhead location away from current residences. No plans are in place for lighting due to excessive costs. See response to Respondent #1 regarding land tenure adjustment. BLM does not favor land sale or easement granting but is cognizant of minimizing negative impacts to adjoining landowners from public land uses.

#12 Opposes closing shooting area. Suggests proposed closure is related to archaeological sites.

Response: Archaeological resources, not a shooting area, are one of the principal reasons BLM has retained this general area as laid out in their 1993 Resource Management Plan. Public input at that time offered no comments regarding the shooting area. Therefore, archaeological resources that predicated retention of this larger area can be related directly to the continuation of this shooting location since the 1993 plan. Also see response to #3.

#13. Respondent believes the preferred alternative is too restrictive to public uses; that the plan is vague based on generalities and not good science, especially with regard to uses at the shooting area. Respondent believes the plan is not related to multiple uses and the local environment ("notable native species and features") has been altered already from mining and other causes. Respondent questions estimates of citations relating to gun use and supposed perceptions of trail users and homeowners of dangers from shooting.

Response: Multiple use does not imply all legal uses and all areas. The area is open to visitation and congregation. Hunting with occasional shooting at game is not comparable to general, unrestricted shooting and target practice where houses and recreation trails are often within line of sight and many more rounds are generally discharged than in hunting activities (also see Figure 6). Certainly there have been historic and modern alterations of the area, some of which include important historic mining features. Well-documented heritage values in excellent condition are found throughout the planning area and Congress has mandated their protection through law and regulation. Management decisions are made on the basis of both scientific data

as well as professional judgment. Such is the case here. Estimations of 25 citable gun related citations each year in the Swasey area is indeed a vague statement. Better put: Law enforcement records show over 25 citable gun related citations each year in the Swasey area. Over 80% of these are related to littering associated with shooting (with at least one pickup truck worth of trash removed each month) (see Appendix 2). Direct safety-related incidents observed in the shooting area are fewer than 10 per year based on periodic visits each week by staff.

#14 Opposes gun range closure. Indicates that shooting ranges are part of the American culture and need protection. Shooters have a right here like other users.

Response: Agree that shooting ranges are part of historic and modern American culture. Unfortunately, urban sprawl and safety-liability issues (human life and well-being) are the prime considerations in the decision making. BLM has planned for a limited phase out of the Swasey shooting area to lessen the burden on shooters as they find new places. Any serious incident, of course, could lead to immediate closure. Furthermore, shooting area trash, sign defacement and enforcement are creating an unnecessary burden on taxpayers.

#15. Opposes shooting area closure. Notes it does not conflict with archaeological site protection nor trail use and is safely situated

Response: Generally the shooting area is away from archaeological sites and main trails and portions of the shooting area can be used safely by responsible shooters. The principal issues have been addressed in previous comments.

#16. Respondent objects to presenting sensitive archaeological information in draft plan.

Response: Information was kept vague and serves to support the argument of site importance and management needs.

#17. Respondent desires to continue permitted religious gathering ceremony in area.

Response: Plan allows such an action.

#18. Wishes BLM to address their liability in the decision making about the range. Believes shooting area is unsafe to adjoining neighborhood.

Response: BLM is quite concerned with its liability regarding the target shooting area and has investigated the safety issues surrounding range use leading to the final decision regarding its disposition. BLM reserves the right to close the target shooting area immediately.

#19 Hopes BLM can find a group interested in sponsoring the target shooting area. Advocates a lengthier phase out than the proposed two year period to coincide with other local range development. Would like BLM to help establish a new or alternative shooting facility.

Response: BLM does not feel it is their responsibility to establish new shooting facilities. BLM has advocated a limited phase out of the Swasey area for four years so that shooters can find or use other locations. BLM has searched without success for a group to assist in the Swasey shooting area management.

#20 Respondent reports heavy shooting, possibly automatic weapons, at the Swasey shooting area, shooting past 5 pm and use of such weapons so close to a residential area unnerving.

Response: BLM has considered this and similar comments in coming to its final decision.

#21 Reports unsafe acts at Swasey shooting area due to crowding, novice shooters, lack of firearms training, and lack of supervision. Advocates a safe range such as Walker Mine proposal.

Response: Considered in management decision.

#22 Advocates continued use of Swasey target shooting area since it provides safe shooting and concentrated use rather than widely scattered use that might be less safe and bothersome.

Response: See other responses.

#23 The State Office of Historic Preservation sees the preferred alternative as a best fit for historic site protection/interpretation following the National Historic Preservation Act regulations.

With regard to the comments from the public meeting, further discussion relevant and not covered above in the previous responses is presented below by major category.

Shooting

Most comments favored retention of the shooting area or extending the proposed phase out, that there is a public need and historic presence at the shooting area and that there is a bias in the draft plan toward closure. Some reporters advocated more control and education regarding the shooting. There were a few comments seeking better documentation regarding safety issues. Several individuals wished to see a link between the Swasey shooting area closure and the opening of another area for shooting.

BLM has conducted an internal, informal safety/risk analysis of the range in response to the public meeting. A diagram is appended (Figure 6) illustrating the range of various ballistics with respect to nearby housing developments, Grant School, trails and general geography clearly showing that lives and public property are within range of certain caliber guns from the shooting area depending on firing direction and ricochet factors. Furthermore, a table is appended (Appendix 2) of contacts made by one of the two office rangers over the last few years regarding citations or warnings for illegal activities in the Swasey area. Many of these contacts are related to gun use, including littering, unsafe shooting, illegal firearms and destruction of government property through shooting. These contacts do not represent all of the unsafe or illegal shooting-related activities that occur in the area since they are from limited visitations. Still, they form a quantifiable basis for reasoned extrapolation.

BLM proposes to better control the shooting while the shooting area is open to limited uses, although signs to that end in the past have been shot up. Formal development adds to BLM's liability should accidents occur and BLM does not wish to be placed in that position since the

decision is to phase out the range due to past incidents and risks BLM is not willing to assume with a range not adequately managed due to funding and personnel shortages.

Education is always the goal regarding shooting safety and littering. BLM has done so locally within its means through public contact, signing, and brochure language.

BLM is not in the business of developing formal shooting areas. There are many acres of accessible public land in the Redding locality open to safe shooting. Land status maps are available through the BLM and USFS offices.

Heritage Resources/Camping

Comments were centered on the value of heritage resources, including Indian sites and camping on sites. Congress has enacted laws regarding archaeological site values. Random camping in the locality is unlikely to damage archaeological sites as long as no digging or campfires occur. Actual site areas are less than 5% of the study area. Primitive camping is consistent with allowable hunting as it is on public lands throughout the nation. Night closure is not inconsistent with primitive camping since vehicles do not need to be used for such camping. In any event, camping is by permit only and permittee will be advised to conduct their activities so as to not harm resource values.

Law Enforcement

One individual wished to see more details regarding law enforcement violations. Such details are shown in the attached Appendix 2.

Other Comments

A larger parking area to accompany horse trailers and more cars is proposed in the final plan.

BLM has revisited the Straight Arrow Bowhunters, Inc. request as discussed previously.

Resource management actions were presented in tabular form in the draft plan by year and cost (see Table). Many of the actions are not statistically comparable but are based on broader scale planning, budget realities, damage assessments, prior management costs, safety and liability concerns (BLM wishes to avoid any costly tort claims that are paid through the taxpayers as discussed under answers to questions posed at the public meeting), laws and regulations, and other factors presented in the draft plan. Certainly many of these priorities are arrived at by professional staff work with public input. Many staff members have years of experience in managing the Swasey location for all of its resources and uses thus bringing a broad viewpoint to its best management under existing workforce and budgetary constraints.

LIST OF PREPARERS

<u>Name</u>	<u>BLM Position</u>	<u>Planning Function</u>
Eric W. Ritter	Archaeologist	Team Leader, Archaeology, History, Native American Indian Coordination
Francis Berg	Chief of Resources	Review, Oversight
John Borgic	Forester	Forestry, Vegetation Management
Andrea Carter	Fuels Specialist	Fire and Fuels Management
Dave Cook	Computer Specialist, GIS	Map Preparation
Irvin Fernandez	Wildlife Biologist.....	Special Status Species
Pat Hagan	Law Enforcement Ranger	Law Enforcement Issues
Stace Hallstrom	Public Contact Representative	Public Contact
Traci Hallstrom	Public Contact Representative	Public Contact, Web Site
Walter Herzog	Fire Management Officer....	Vegetation Management, Fire Suppression
Keith Hughes	Wildlife Biologist	Wildlife Management Issues
Andy Isola	OHV Specialist	OHV Recreation Management
Bill Kuntz	Outdoor Recreation Planner	Recreation Issues
Brandt Gutermuth	Fisheries Biologist	Fisheries Resources
Patrick Mikesell	Realty Clerk	Ownership Information
Glen R. Miller	Planning and Environmental Coordinator	Oversight
Joe Molter	Botanist	Special Status Plant Mgt, Vegetation, Weeds
Gary Mullett	Engineer	Roads, Developments
Susie Rodriguez	Realty Specialist	Realty Issues
Ron Rogers	Geologist	Geology, Minerals
Chuck Schultz	Field Manager (to 2004)	Oversight
Steven Anderson	Field manager.....	Oversight
Karl Stein	Supervisory Fisheries Biologist	Fisheries Management
Andy Suppiger	GIS Specialist.....	Map Preparation
Mike Truden	Supervisory Realty Specialist	Realty Issues
Joe Tyler	Maintenance Specialist	Facility Maintenance Issues

APPENDIX 1
Documented Archaeological Sites in the Planning Area

Site Number	Site Name	Characteristics
CA-SHA-1780/H	Confusion Cabin	historic cabin foundation and refuse scatter, small dam and reservoir (Clear Creek Ditch associated?)
CA-SHA-1781/H	Bed Shed	Early 20th century habitation site—cabin, dump
CA-SHA-1782/H	Caterpillar Ditch	mining ditch, two rock dams, smaller ditches
CA-SHA-1783/H	Our First	19 th century cabin foundation, arrastra, tailing features
CA-SHA-1784/H	Boswell Mine	mining complex of foundations and workings
CA-SHA-2165/H	Clear Creek Ditch	segment of major ditch in county
CA-SHA-2426/H	Caitlan Dam	Historic rock and earth dam, reservoir, tailings, depression and ditch related to mining
CA-SHA-2427/H	Druid Dam	Small historic dam, tailings, stone wall and rock plugs related to mining
CA-SHA-2428/H	Maeve Dam	Historic rock and earth dam and reservoir related to mining
CA-SHA-2429/H	Adam Springs	historic spring development, dam, reservoir, tailings and building pads.
CA-SHA-1544/H	Middle Mule Pond Site	Major midden deposit partially excavated by CSU Chico
CA-SHA-1785/H	Trench Site	older appearing midden site
CA-SHA-1779	Ring Site	shallow lithic scatter with possible housepit
CA-SHA-1786	Here-Be-Bees Site	major midden deposit
CA-SHA-1991	Tanya Site	major midden site with large community house partially excavated by Shasta College
CA-SHA-2424	PaHa Site	housepit village with midden
CA-SHA-2425	Rollerskate Site	probable temporary camp with shallow deposit
CA-SHA-2430	Ryan Site	small occupation midden and historic cabin foundation and dump
CA-SHA-2433/H	Thistle Ridge Site	Moderate sized midden and cabin foundation—edge of planning area
None	Olney Creek Mortar	isolated hopper mortar

APPENDIX 2
Swasey Area Law Enforcement Incident Log (1996-2004)

DATE	OFFENSE/CD	INCIDENT	FINE	LOCATION	COMMENTS
10/6/1996	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
10/6/1996	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
10/6/1996	43 CFR 8365.1-1(b)(4)	62	F\$ 75	SWASEY D	DISPOSE OF WASTE
10/15/1996	43 CFR 8365.1-1(a)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
10/20/1996	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
10/30/1996	F&G 2006	69	NONE	SWASEY D	LOADED GUN IN VE
10/31/1996	43 CFR 8365/1-4(a)(2)	70	F\$ 50	SWASEY D	CREATING A HAZAR
11/2/1996	43 CFR 2920.1-2(e)	10	NONE	SWASEY D	NO PERMIT - COMM
11/3/1996	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
11/11/1996	43 CFR 8365.1-4(a)(2)	70	F\$ 50	SWASEY D	CREATING A HAZAR
11/11/1996	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATING A HAZAR
1/11/1997	18 USC 1853	07	NONE	SWASEY D	TREES CUT OR INJU
1/11/1997	18 USC 1853	07	NONE	SWASEY D	TREES CUT OR INJU
1/18/1997	43 CFR 8365.1-4(a)(2)	70		SWASEY D	CREATING A HAZAR
1/18/1997	43 CFR 8365.1-4(a)(2)	70		SWASEY D	CREATING A HAZAR
1/18/1997	43 CFR 4140.1(b)(3)	14	DISMISSED	SWASEY D	CUTTING VEGETATI
1/18/1997	18 USC 1853	14	DISMISSED	SWASEY D	TREES CUT OR INJU
1/18/1997	43 CFR 8365.1-6	52		SWASEY D	OPEN CONTAINER-V
1/18/1997	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
1/18/1997	43 CFR 8365.1-6	52	F\$ 50	SWASEY D	OPEN CONTAINER-V
1/19/1997	43 CFR 8365.1-4(a)(2)	70		SWASEY D	CREATING A HAZAR
1/19/1997	43 CFR 4140.1(b)(4)	41		SWASEY D	DESTROY GOV'T PR
1/19/1997	43 CFR 8365.1-4(a)(2)	70		SWASEY D	CREATING A HAZAR
2/9/1997	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/9/1997	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/9/1997	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - REGISTRATIO
2/17/1997	43 CFR 8365.1-4(a)(2)	57	F\$ 50	SWASEY D	CREATING A HAZAR
2/17/1997	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
2/17/1997	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
2/17/1997	43 CFR 8365.1-4(a)(2)	70	F\$ 50	SWASEY D	CREATING A HAZAR
3/2/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/9/1997	43 CFR 8343.1(b)	52	DISMISSED	SWASEY D	OHV - MUFFLER
3/29/1997	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING

3/29/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/29/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/29/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/29/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
4/5/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
4/5/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
4/5/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/8/1997	43 CFR 8365.1-1(b)(4)	62	F\$200/R\$316.	SWASEY D	DISPOSE OF WASTE
6/21/1997	43 CFR 4140.1(b)(6)	63	\$ 50	SWASEY D	LITTERING
6/21/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/6/1997	43 CFR 8365.1-4(a)(2)	61	DISMISSED	SWASEY D	CREATING A HAZAR
7/6/1997	43 CFR 4140.1(b)(6)	63	DISMISSED	SWASEY D	LITTERING
7/19/1997	43 CFR 8341.1(d)	52	F\$ 50	SWASEY D	OHV - REGISTRATIO
7/26/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/26/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/26/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/30/1997	43 CFR 8365.1-1(b)(4)	62	F\$175/R\$ 50	SWASEY D	DISPOSE OF WASTE
8/30/1997	43 CFR 8365.1-1(b)(4)	62	2 DAYS/R\$50	SWASEY D	DISPOSE OF WASTE
8/30/1997	43 CFR 8365.1-4(a)(2)	70	1 DAY	SWASEY D	CREATING A HAZAR
8/30/1997	43 CFR 8365.1-4(a)(2)	70	2 DAYS	SWASEY D	CREATING A HAZAR
8/30/1997	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
8/30/1997	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATING A HAZAR
8/31/1997	43 CFR 8365.1-6	70	F\$ 50	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
8/31/1997	43 CFR 8365.1-1(b)(4)	62	DISMISSED	SWASEY D	DISPOSE OF WASTE
8/31/1997	43 CFR 8364.1-4(a)(2)	61	F\$ 25	SWASEY D	CREATING A HAZAR
10/13/1997	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/13/1997	43 CFR 4140.1(b)(6)	63	\$ 50	SWASEY D	LITTERING
10/13/1997	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING

11/14/1997	43 CFR 8365.1-1(b)(4)	62	NONE - IEtP	SWASEY D	DISPOSE OF WASTE
11/14/1997	43 CFR 8365.1-4(a)(2)	61	NONE - IEtP	SWASEY D	CREATING A HAZAR
11/21/1997	43 CFR 3841.1(d)	52	NONE/JUVENI	SWASEY D	OHV - HELMET
12/15/1997	43 CFR 8365.1-4(a)(2)	61	NONE	SWASEY D	CREATING A HAZAR
1/9/1998	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
1/17/1998	43 CFR 8365.1-6	70	F\$ 50	SWASEY D	ALCOHOL - JUVENIL
1/19/1998	43 CFR 8341.1(f)(4)	69	F\$ 75	SWASEY D	CAUSE ENVIR DAMA
1/19/1998	43 CFR 8341.1(b)	69	F\$ 75	SWASEY D	OHV OFF DESIGNAT
1/19/1998	43 CFR 4140.1(b)(3)	69	DISMISSED	SWASEY D	DESTROYING VEGE
1/31/1998	43 CFR 8365.1-6	70	F\$ 50	SWASEY D	ALCOHOL - JUVENIL
1/31/1998	43 CFR 8365.1-6	70	F\$ 50	SWASEY D	ALCOHOL - JUVENIL
2/7/1998	43 CFR 8341.1(b)	53	DISMISSED W	SWASEY D	OHV - OFF TRAIL/RO
2/7/1998	43 CFR 8365.1-5(a)(1)	69	DISMISSED W	SWASEY D	CAUSE ENVIR DAMA
2/8/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8341.1(f)	52	F\$ 50	SWASEY D	CAUSE ENVIR DAMA
2/8/1998	43 CFR 8341.1(d)	52	F\$100	SWASEY D	OHV - REGISTRATIO
2/8/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8341.1(d)	52	F\$100	SWASEY D	OHV - REGISTRATIO
2/8/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8343.1(c)	52	NONE	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8343.1(c)	52	NONE	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
2/8/1998	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
2/8/1998	43 CFR 8343.1(c)	52	NONE	SWASEY D	OHV - MUFFLER
2/13/1998	43 CFR 8365.1-6	70	F\$ 50	SWASEY D	ALCOHOL - JUVENIL
2/13/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
2/13/1998	43 CFR 8341.1(f)(4)	69	F\$ 50	SWASEY D	CAUSE ENVIR DAMA
2/13/1998	43 CFR 8365.1-6	70	NONE	SWASEY D	ALCOHOL - JUVENIL
2/15/1998	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
2/15/1998	43 CFR 8365.1-4(A)(2)	70	NONE	SWASEY D	CREATING A HAZAR
2/15/1998	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATING A HAZAR
2/27/1998	43 CFR 8341.1(c)	54	F\$ 50	SWASEY D	OHV - CLOSED ARE
2/27/1998	43 CFR 8341.1(f)(4)	69	F\$ 50	SWASEY D	CAUSE ENVIR DAMA
2/28/1998	43 CFR 8341.1(c)	54	NONE	SWASEY D	OHV - CLOSED ARE

2/28/1998	43 CFR 8341.1(c)	54	NONE	SWASEY D	OHV - CLOSED ARE
2/28/1998	43 CFR 8341.1(c)	54	F\$ 50	SWASEY D	OHV - CLOSED ARE
2/28/1998	43 CFR 8341.1(d)	52	F\$ 50	SWASEY D	OHV - REGISTRATIO
3/8/1998	43 CFR 4140.1(b)(4)	69		SWASEY D	DAMAGE U.S. PROP
3/8/1998	43 CFR 4140.1(d)(4)	69	NONE	SWASEY D	DAMAGE U.S. PROP
3/9/1998	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATING A HAZAR
3/9/1998	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATING A HAZAR
3/15/1998	43 CFR 2920.1-2(e)	54	NONE	SWASEY D	OHV - CLOSED ARE
3/22/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
3/23/1998	18 USC 1361	42	NONE	SWASEY D	VANDALISM/SIGNS
3/29/1998	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - REGISTRATIO
5/30/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
5/30/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/13/1998	43 CFR 8341.1(c)	53	NONE	SWASEY D	DRIVING OFF ROAD
6/13/1998	43 CFR 8341.1(c)	53	NONE	SWASEY D	DRIVING OFF ROAD
6/13/1998	43 CFR 8341.1(c)	53	NONE	SWASEY D	DRIVING OFF ROAD
6/13/1998	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
6/13/1998	43 CFR 8365.1-4(A)(2)	61	NONE	SWASEY D	CREATING A HAZAR
6/13/1998	43 CFR 8365.1-4(a)(2)	61	NONE	SWASEY D	CREATING A HAZAR
6/27/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/27/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/3/1998	CAPC 12276	70	NONE	SWASEY D	POSS. ASSAULT WE
7/3/1998	CAPC 12276	70	NONE	SWASEY D	POSS. ASSAULT WE
8/23/1998	43 CFR 4140.1(b)(6)	63	\$F 50	SWASEY D	LITTERING
8/28/1998	43 CFR 8343.1(c)	52	NONE	SWASEY D	SPARK ARRESTOR
8/28/1998	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - REGISTRATIO
9/1/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
9/1/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/1/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/6/1998	43 CFR 4140.1(b)(6)	63	F\$125	SWASEY D	LITTERING
9/6/1998	43 CFR 8365.1-4(b)(2)	38	F\$275	SWASEY D	POSS. OF MARIJUA
9/6/1998	43 CFR 8365.1-4(a)(2)	69	F\$ 75	SWASEY D	CREATING A HAZAR
9/6/1998	43 CFR 4140.1(b)(6)	63	F\$135	SWASEY D	LITTERING
9/6/1998	43 CFR 8365.1-4(b)(2)	38	F\$275	SWASEY D	POSS. OF MARIJUA

9/6/1998	43 CFR 8365.1-4(a)(2)	69	F\$ 75	SWASEY D	CREATING A HAZAR
9/7/1998	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/20/1998	43 CFR 8341.1(c)	54	F\$ 50	SWASEY D	CLOSED AREA - VEH
9/20/1998	43 CFR 8341.1(c)	54	F\$ 50	SWASEY D	CLOSED AREA - VEH
9/20/1998	43 CFR 8365.1-6	52	F\$ 50	SWASEY D	OPEN CONTAINER-A
9/20/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
9/20/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
9/20/1998	43 CFR 8365.1-6	52	NONE	SWASEY D	OPEN CONTAINER-A
9/26/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
9/26/1998	43 CFR 4140.1(b)(6)	63	DISMISSED	SWASEY D	LITTERING
9/26/1998	43 CFR 4140.1(b)(6)	63	DISMISSED	SWASEY D	LITTERING
9/26/1998	43 CFR 9212.1(h)	70	W\$150/NO PR	SWASEY D	ILLEGAL CAMPFIRE
10/11/1998	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
10/11/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
10/11/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
10/11/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
10/16/1998	43 CFR 8365.1-1(b)(1)	63	F\$ 25	SWASEY D	DISPOSE OF WASTE
10/22/1998	43 CFR 9264.1(a)	62	IRS	SWASEY D	DISPOSE OF WASTE
10/10/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
10/24/1998	43 CFR 8341.1(c)	54	F\$ 50	SWASEY D	OHV - CLOSED ARE
10/24/1998	43 CFR 8341.1(c)	54	NONE	SWASEY D	OHV - CLOSED ARE
10/31/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
10/31/1998	32 CFR 8365.1-6	52	F\$ 50	SWASEY D	OHV - ALCOHOL
10/31/1998	43 CFR 4140.1(b)(6)	63	IRS	SWASEY D	LITTERING
10/31/1998	43 CFR 8341.1(d)	52	IRS	SWASEY D	DRIVING W/O LICEN
11/14/1998	43 CFR 8343.1(c)	52	NO. PROS.	SWASEY D	OHV - MUFFLER
11/14/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
11/14/1998	43 CFR 8341.1(d)	52	F\$100	SWASEY D	OHV - REGISTRATIO
11/22/1998	43 CFR 8341.1(b)	53	F\$ 50	SWASEY D	OHV - OFF TRAIL
11/22/1998	43 CFR 8343.1(c)	52	F\$ 25	SWASEY D	OHV - MUFFLER
11/28/1998	43 CFR 8341.1(b)	53	F\$ 50	SWASEY D	OHV - TRAIL
12/4/1998	43 CFR 8365.1-2(a)	64	\$ 25	SWASEY D	EXCEED CAMP LIMIT
12/14/1998	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
1/9/1999	43 CFR 8365.1-6	52	F\$ 50	SWASEY D	OPEN CONTAINER-A

1/9/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
1/9/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
1/9/1999	43 CFR 4140.1(b)(6)	63	W\$???	SWASEY D	LITTERING
1/16/1999	43 CFR 8341.1(b)	54	F\$ 50	SWASEY D	OHV - OFF TRAIL/RO
1/23/1999	43 CFR 8341.1(b)	53	F\$ 50	SWASEY D	OHV - CLOSED ARE
2/13/1999	43 CFR 8364.1(d)	54	NONE	SWASEY D	CLOSURE ORDER/V
2/13/1999	43 CFR 8364.1(d)	54	NONE	SWASEY D	CLOSURE ORDER/V
2/13/1999	43 CFR 8364.1(d)	54	NONE	SWASEY D	CLOSURE ORDER/V
2/21/1999	43 CFR 8365.1-4(a)(2)	61	NONE	SWASEY D	CREATE A HAZARD
2/25/1999	43 CFR 8341.1(c)	54	F\$ 75 + C \$25	SWASEY D	ORV IN CLOSED AR
2/25/1999	43 CFR 8341.1(c)	54	NONE	SWASEY D	ORV IN CLOSED AR
2/25/1999	43 CFR 4140.1(b)(4)	42	F\$100	SWASEY D	DAMAGE U.S. PROP
2/25/1999	43 CFR 4140.1(b)(4)	42	NONE	SWASEY D	DAMAGE U.S. PROP
3/20/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
3/20/1999	43 CFR 8365.1-4(a)(2)	61	F\$ 50	SWASEY D	CREATING A HAZAR
3/20/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
3/20/1999	43 CFR 8365.1-4(a)(2)	61	F\$ 50	SWASEY D	CREATING A HAZAR
3/20/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/21/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
3/21/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/21/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/26/1999	43 CFR 8341.1(d)	52	F\$ 75	SWASEY D	OHV - REGISTRATIO
3/26/1999	43 CFR 8364.1(d)	54	F\$ 75	SWASEY D	OHV - CLOSED ARE
3/26/1999	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - REGISTRATIO
3/26/1999	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
3/28/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
3/28/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/28/1999	43 CFR 9264.1(h)	56	F\$270	SWASEY D	F&G - GUN IN VEHIC
3/30/1999	43 CFR 8341.1(c)	54	NONE	SWASEY D	ORV - CLOSED ARE
3/30/1999	F&G 257.5	69	NONE	SWASEY D	F&G - BAITING NG BI
4/11/1999	43 CFR 8364.1(d)	54	F\$ 50	SWASEY D	OHV - CLOSED ARE
4/11/1999	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - INSURANCE
5/10/1999	43 CFR 8341.1(d)	52	F\$135 + CC \$2	SWASEY D	OHV - REGISTRATIO
5/10/1999	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO

5/22/1999	43 CFR 8365.1-6	52	F\$ 50	SWASEY D	OHV - OPEN CONTAI
5/22/1999	43 CFR 4140.1(b)(4)	41	W\$300	SWASEY D	DAMAGE U.S. PROP
5/22/1999	CA PC 12025	70	NONE	SWASEY D	CARRY CONCEAL PI
5/29/1999	43 CFR 8365.1-6	52	IRS	SWASEY D	OPEN CONTAINER-A
5/29/1999	43 CFR 8341.1(d)	52	ABSTRACT	SWASEY D	OHV - REGISTRATIO
5/29/1999	43 CFR 8341.1(d)	52	ABSTRACT	SWASEY D	OHV - INSURANCE
6/21/1999	43 CFR8365.1-2(b)	68	NONE	SWASEY D	ABAONDON PROP -
6/21/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/26/1999	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
6/27/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
6/27/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
6/27/1999	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
7/4/1999	43 CFR 8365.1-6	70	F\$150 + CC \$2	SWASEY D	SHOOT IN CLOSED
7/4/1999	43 CFR 8341.1(f)(4)	69	F\$150 + CC \$2	SWASEY D	CAUSE ENVIR. DAM
7/4/1999	43 CFR 8341.1(d)	52	F\$270 + CC \$2	SWASEY D	DRIVING W/O LICEN
7/11/1999	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
7/23/1999	43 CFR 8365.1-1(b)(4)	62	F\$150 + CC \$2	SWASEY D	DISPOSE OF COMM
7/23/1999	43 CFR 4140.1(b)(3)	69	NONE	SWASEY D	CUTTING/BURNING
7/23/1999	43 CFR 9212.1(d)	60	F\$100 + CC \$2	SWASEY D	ABANDONED CAMPF
7/24/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/24/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/24/1999	43 CFR 8341.1(d)	52	F\$1350 + CC \$	SWASEY D	OHV - INSURANCE
8/6/1999	43 CFR 4140.1(b)(6)	63	DISMISSED	SWASEY D	LITTERING
8/6/1999	43 CFR 8365.1-4(a)(2)	61	DISMISSED	SWASEY D	CREATING A HAZAR
8/6/1999	43 CFR 8341.1(d)	52	F\$ 70 + CC\$ 2	SWASEY D	OHV - REGISTRATIO
8/6/1999	43 CFR 8341.1(d)	52	F\$250 + CC\$ 2	SWASEY D	OHV - INSURANCE
8/6/1999	43 CFR 8365.1-4(b)(2)	70	F\$250 + CC\$ 2	SWASEY D	POSS OF MARIJUAN
8/6/1999	43 CFR 4140.1(b)(6)	63	F\$75 + CC \$25	SWASEY D	LITTERING
8/6/1999	43 CFR 8365.1-4	61	F\$100 + CC \$2	SWASEY D	CREATING A HAZAR
8/6/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/6/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/6/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/6/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/13/1999	43 CFR 4140.1(B)(6)	63	NONE	SWASEY D	LITTERING

8/21/1999	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
8/21/1999	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
9/5/1999	43 CFR 8341.1(d)	52	F\$ 95	SWASEY D	OHV - NO HELMET
9/5/1999	43 CFR 8341.1(d)	52	F\$ 25	SWASEY D	OHV - RIDING DOUB
9/6/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
9/6/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/11/1999	43 CFR 8365.1-4(b)(2)	38	COUNCELING	SWASEY D	POSS CONTROL SU
9/11/1999	43 CFR 8364.1(d)	52	COUNCELING	SWASEY D	VIOL. CLOSURE OR
9/11/1999	43 CFR 8365.1-4(b)(2)	38	COUNSELING	SWASEY D	POSS CONTROL SU
9/17/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
9/17/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/17/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/18/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
9/18/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/19/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
9/19/1999	43 CFR 4140.1(b)(6)	63	F\$ 75 + CC \$2	SWASEY D	LITTERING
9/19/1999	43 CFR 8341.1(d)	52	F\$135 + CC \$2	SWASEY D	OHV - REGISTRATIO
9/19/1999	43 CFR 8341.1(d)	52	F\$1350 + CC \$	SWASEY D	OHV - INSURANCE
10/10/1999	43 CFR 8341.1(d)	52	F\$135 + CC \$2	SWASEY D	OHV - REGISTRATIO
10/10/1999	43 CFR 8341.1(d)	52	F\$540 + CC \$2	SWASEY D	OHV - INSURANCE
10/11/1999	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
10/22/1999	43 CFR 8364.1(d)	69	F\$150	SWASEY D	VIOLATE CLOSURE
10/22/1999	43 CFR 8364.1(d)	69	F\$150	SWASEY D	VIOLATE CLOSURE
10/22/1999	43 CFR 8364.1(d)	69	DISMISSED	SWASEY D	VIOLATE CLOSURE
10/22/1999	43 CFR 8364.1(d)	69	F\$150	SWASEY D	VIOLATE CLOSURE
10/22/1999	CAPC 12091	69		SWASEY D	POSS.ALTER. GUN S
10/31/1999	43 CFR 440.1(b)(6)	63	WRK 1DY/MO-	SWASEY D	LITTERING
11/7/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
11/7/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
11/7/1999	43 CFR 8343.1(c)	52	F\$ 25 + CC \$2	SWASEY D	OHV - MUFFLER
11/7/1999	43 CFR 8343.1(c)	52	NONE FIX-IT	SWASEY D	OHV - MUFFLER
11/7/1999	43 CFR 8341.1(d)	52	NONE FIX-IT	SWASEY D	OHV - REGISTRATIO
11/11/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
11/11/1999	43 CFR 4140.1(b)(6)	63J	NONE	SWASEY D	LITTERING

12/5/1999	43 CFR 8341.1(d)	52	F\$135	SWASEY D	OHV - REGISTRATIO
12/5/1999	43 CFR 4140.1(b)(3)	69	NONE	SWASEY D	DESTROY VEGETATI
12/5/1999	43 CFR 4140.1(b)(3)	69	NONE	SWASEY D	DESTROY VEGETATI
12/3/1999	43 CFR 8365.1-1(b)(4)	62	W\$5000	SWASEY D	DISPOSE OF WASTE
12/16/1999	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
12/16/1999	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
12/16/1999	43 CFR 8341.1(d)	52	W\$1000	SWASEY D	OHV - NO REGISTRA
12/16/1999	43 CFR 8341.1(d)	52	W\$1000	SWASEY D	OHV - NO INSURANC
12/16/1999	43 CFR 8364.1(d)	70	F\$150	SWASEY D	VIOLATE CLOSURE
1/8/2000	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - INSURANCE
1/8/2000	43 CFR 8365.1-6	70	F\$150	SWASEY D	OHV - ALCOHOL
1/8/2000	43 CFR 8341.1(d)	52	F\$270	SWASEY D	DRIVE W/O LICENSE
1/8/2000	18 USC 1361	42	NONE	SWASEY D	DESTROY GOV'T PR
1/8/2000	43 CFR 8365.1-6	52	F\$500 + CC \$2	SWASEY D	ALCOHOL - JUVENIL
1/8/2000	43 CFR 8365.1-6	52	F\$500 + CC \$5	SWASEY D	ALCOHOL - JUVENIL
1/14/2000	43 CFR 8364.1(d)	53	F\$189	SWASEY D	OHV - CLOSED ARE
1/14/2000	43 CFR 8364.1(d)	53	NONE	SWASEY D	OHV - CLOSED ARE
1/14/2000	43 CFR 8364.1(d)	53	NONE	SWASEY D	OHV - CLOSED ARE
1/15/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
1/15/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
1/15/2000	43 CFR 8365.1-6	70	F\$150	SWASEY D	POSS. ALCOHOL IN
1/15/2000	43 CFR 8372.0-7(a)(1)	69	NONE	SWASEY D	NO REC PERMIT
1/17/2000	CA PC 12285(C)(6)	70	NONE	SWASEY D	POSS. ASSAULT WE
1/17/2000	CA PC 12285(C)(6)	70	NONE	SWASEY D	POSS. ASSAULT WE
1/20/2000	CA PC 12285(C)(6)	70	NONE	SWASEY D	POSS. ASSAULT WE
1/20/2000	CA PC 12285(C)(6)	70	NONE	SWASEY D	POSS. ASSAULT WE
1/29/2000	43 CFR 8364.1(d)	70	F\$150	SWASEY D	VIOLATE CLOSURE
1/29/2000	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - INSURANCE
2/6/2000	43 CFR 8364.1(d)	53		SWASEY D	OHV - CLOSED ARE
2/6/2000	43 CFR 8364.1(d)	53		SWASEY D	OHV - CLOSED ARE
2/6/2000	43 CFR 8341.1(d)	52		SWASEY D	OHV - REGISTRATIO
2/6/2000	43 CFR 8364.1(d)	53		SWASEY D	OHV - CLOSED ARE
2/6/2000	43 CFR 8341.1(d)	52		SWASEY D	OHV - INSURANCE
2/11/2000	43 CFR 8341.1(f)(4)	41	NONE	SWASEY D	CAUSE ENVIR. DAM

2/12/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/25/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/25/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/26/2000	43 CFR 8364.1	53	F\$150	SWASEY D	OHV - CLOSED ARE
3/26/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
4/9/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
4/9/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
2/27/2000	43 CFR 8365.1-6	52		SWASEY D	POSS. OF ALCOHOL/
2/29/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
2/29/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
2/29/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
3/12/2000	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
3/12/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/12/2000	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
3/12/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/12/2000	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
3/12/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/19/2000	43 CFR 8364.1(d)	69	F\$150	SWASEY D	VIOLATE CLOSURE
3/21/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
3/21/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
5/6/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
4/29/2000	43 CFR 8364.1(d)	54	F\$150 + CC \$2	SWASEY D	OHV - CLOSED ARE
4/29/2000	43 CFR 8343.1©	52	F\$ 50 + CC \$2	SWASEY D	OHV - MUFFLER
4/29/2000	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
4/29/2000	43 CFR 8364.1(d)	54	F\$150 + CC \$2	SWASEY D	OHV - CLOSED ARE
4/29/2000	43 CFR 8364.1(d)	54	DISMISSED	SWASEY D	OHV - CLOSED ARE
4/30/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
5/6/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
5/6/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
5/6/2000	43 CFR 8365.1-4	61	F\$100	SWASEY D	CREATE A HAZARD
5/20/2000	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
5/20/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
5/26/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
5/26/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING

6/23/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
6/23/2000	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
7/4/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/4/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/4/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
7/16/2000	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
7/22/2000	43 CFR 4140.1(b)(4)	42	F\$150	SWASEY D	DAMAGE U.S. PROP
7/22/2000	43 CFR 4140.1(b)(4)	42	F\$150	SWASEY D	DAMAGE U.S. PROP
7/1/2000	43 CFR 8365.1-1(b)(4)	62	F\$150	SWASEY D	DISPOSE OF WASTE
8/18/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
8/18/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
8/19/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/19/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
8/26/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/9/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/16/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/16/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/16/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/16/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/17/2000	43 CFR 8365.1-2(a)	64	NONE	SWASEY D	EXCEED CAMP LIMIT
9/30/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/14/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/14/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/14/2000	43 CFR 4140.1(b)(4)	42	F\$250	SWASEY D	DAMAGE GOV'T PRO
10/21/2000	43 CFR 4140.1(b)(6)	63	F\$150 + CC \$2	SWASEY D	LITTERING
10/21/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/21/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/29/2000	43 CFR 4140.1(b)(6)	63	F\$125 + CC \$2	SWASEY D	LITTERING
10/29/2000	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
11/11/2000	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
11/11/2000	43 CFR 8364.1(d)	54	NONE	SWASEY D	OHV - CLOSED ARE
11/11/2000	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
11/11/2000	43 CFR 8365.1-4(a)(2)	61	F\$100	SWASEY D	CREATE A HAZARD
11/11/2000	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING

11/11/2000	43 CFR 8365.1-4(a)(2)	61	F\$150	SWASEY D	CREATE A HAZARD
12/2/2000	CPC 12285©(6)	70	NONE	SWASEY D	POSS. ASSUALT WE
12/30/2000	43 CFR 8364.1(d)	52	F\$135	SWASEY D	OHV - REGISTRATIO
1/2/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
1/13/2001	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - HELMET
1/19/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
1/19/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
1/19/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
1/19/2001	43 CFR 9264.1(h)	62	F\$150	SWASEY D	ILLEGAL DUMPING
1/21/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
2/3/2001	43 CFR 8364.1(d)	57		SWASEY D	VIOLATE CLOSURE
2/3/2001	43 CFR 8341.1(d)	52		SWASEY D	OHV - REGISTRATIO
2/3/2001	43 CFR 8364.1(d)	57		SWASEY D	VIOLATE CLOSURE
2/17/2001	43 CFR 9264.1(h)	69	NONE	SWASEY D	CULTURAL RES. DE
2/25/2001	43 CFR 9264.1(h)	41	F\$100 + R\$25	SWASEY D	HISTORICAL SITE D
3/3/2001	43 CFR 4140.1(b)(6)	63	F\$150 + CC \$2	SWASEY D	LITTERING
3/3/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(6)	63	W 2 HRS/DIS	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/10/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
3/10/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(4)	42	F\$250	SWASEY D	DAMAGE GOV'T PRO
3/10/2001	43 CFR 4140.1(b)(6)	63	F\$150 + CC \$2	SWASEY D	LITTERING
3/10/2001	43 CFR 4140.1(b)(4)	42	F\$250 + CC \$2	SWASEY D	DAMAGE GOV'T PRO
3/10/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/18/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/18/2001	43 CFR 4140.1b)(6)	63	NONE	SWASEY D	LITTERING
3/18/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/20/2001	43 CFR 8364.1(d)	54	F\$150	SWASEY D	VIOLATE CLOSURE
3/25/2001	43 CFR 4140.1(b)(6)	63	F\$150 + CC \$2	SWASEY D	LITTERING
3/25/2001	43 CFR 8365.1-4(a)(2)	61	DISMISSED	SWASEY D	CREATE A HAZARD
3/25/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING

4/1/2001	43 CFR 4140.1(b)(6)	63	F\$100 + CC \$2	SWASEY D	LITTERING
4/5/2001	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
4/7/2001	43 CFR 8364.1(d)	53	F\$150	SWASEY D	VIOLATE CLOSURE
4/7/2001	43 CFR 8364.1(d)	53	F\$150 + CC \$2	SWASEY D	VIOLATE CLOSURE
4/22/2001	43 CFR 8341.1(d)	52	F\$135	SWASEY D	OHV - REGISTRATIO
4/27/2001	43 CFR 8365.1-1(b)(4)	62	R\$100	SWASEY D	DISPOSE OF WASTE
4/27/2001	43 CFR 8365.1-4(a)(2)	62	NONE	SWASEY D	CREATE A HAZARD
5/26/2001	43 CFR 8365.1-4(a)(2)	61		SWASEY D	CREATE A HAZARD
5/27/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
6/1/2001	43 CFR 8365.1-6	52	F\$250	SWASEY D	OPEN CONTAINER
6/1/2001	43 CFR 8365.1-6	52	F\$250	SWASEY D	OPEN CONTAINER
6/1/2001	43 CFR 8365.1-6	52	F\$250	SWASEY D	OPEN CONTAINER
6/2/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
6/30/2001	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING
6/30/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/30/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/13/2001	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
7/14/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/14/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/14/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
7/14/2001	43 CFR 4140.1(b)(6)	63	W \$450	SWASEY D	LITTERING
7/14/2001	43 CFR 8341.1(d)	52	JAIL 25/CC \$2	SWASEY D	DRIVE ON SUSP. LIC
7/21/2001	CAPC 12285	70	NONE	SWASEY D	POSS. ASSAULT WE
7/28/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
7/28/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/2/2001	43 CFR 8364.1(d)	54	F \$40 + CC \$2	SWASEY D	VIOL. CLOSURE OR
10/5/2001	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
10/5/2001	43 CFR 8341.1(d)	52	C \$135 + CC \$	SWASEY D	OHV - REGISTRATIO
10/5/2001	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - INSURANCE
10/8/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/8/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/8/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
10/13/2001	43 CFR 4140.1(b)(6)	63	W \$450	SWASEY D	LITTERING
10/13/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING

10/13/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/13/2001	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/13/2001	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
11/3/2001	43 CFR 8365.1-6	52	F\$250	SWASEY D	OPEN CONTAINER
12/2/2001	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
1/4/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
1/4/2002	43 CFR 4140.1(b)(4)	42	F\$250	SWASEY D	DAMAGE GOV'T PRO
1/4/2002	43 CFR 4140.1(b)(6)	63	R\$62.80	SWASEY D	LITTERING
1/4/2002	43 CFR 4140.1(b)(4)	42	3 DAYS	SWASEY D	DAMAGE GOV'T PRO
1/26/2002	43 CFR 4140.1(b)(4)	41	NONE	SWASEY D	DAMAGE GOV'T PRO
1/26/2002	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
1/26/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
1/26/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
1/26/2002	43 CFR 4140.1(b)(6)	63	W\$300	SWASEY D	LITTERING
1/26/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
1/27/2002	43 CFR 8364.1(d)	54	NONE	SWASEY D	OHV - CLOSED ARE
1/27/2002	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
1/31/2002	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY A	DISPOSE OF WASTE
1/31/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
1/31/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
2/8/2002	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
2/8/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
2/23/2002	43 CFR 8364.1(d)	53	NONE	SWASEY D	VIOLATE CLOSURE
2/23/2002	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
2/23/2002	43 CFR 8341.1(d)	52	DMV ABSTRA	SWASEY D	OHV - REGISTRATIO
2/23/2002	43 CFR 8341.1(d)	52	DMV ABSTRA	SWASEY D	OHV - REGISTRATIO
2/23/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/8/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
3/8/2002	43 CFR 9212.1(h)	70	NONE	SWASEY D	POSS. FIREWORKS
3/8/2002	43 CFR 9212.1(h)	70	NONE	SWASEY D	POSS. FIREWORKS
3/8/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
3/8/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
5/5/2002	43 CFR 8365.1-6	62	F\$150	SWASEY D	DUMPING REFUSE
5/18/2002	43 CFR 8364.1(d)	54	NONE	SWASEY D	OHV - CLOSED ARE

5/25/2002	43 CFR 8364.1(d)	53	NONE	SWASEY D	OHV - CLOSED ARE
5/25/2002	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
5/25/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
5/27/2002	43 CFR 4140.1(b)(6)	63	F\$ 75 + CC \$2	SWASEY D	LITTERING
5/27/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
5/27/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
6/1/2002	43 CFR 8364.1(d)	54	C.S. 10 HOUR	SWASEY D	VIOLATE CLOSURE
6/1/2002	CA-F&G 2006	56	COMM. SERVI	SWASEY D	LOADED GUN IN VE
6/1/2002	CA-F&G 3800	70	COMM. SERVI	SWASEY D	SHOOT NONGAME B
6/1/2002	CA-F&G 2006	56	C.S. 10 HOUR	SWASEY D	LOADED GUN IN VE
6/1/2002	43 CFR 8364.1(d)	54	NONE	SWASEY D	VIOLATE CLOSURE
6/1/2002	43 CFR 8364.1(d)	54	NONE	SWASEY D	VIOLATE CLOSURE
6/28/2002	43 CFR 8365.1-6	70	F\$250 + CC \$2	SWASEY D	MINOR IN POSSESSI
6/28/2002	43 CFR 8341.1(d)	52	F\$405 + CC \$2	SWASEY D	OHV - DRIVE W/O LI
6/28/2002	43 CFR 8341.1(d)	52	F\$405 + CC \$2	SWASEY D	OHV - DRIVE W/O LI
6/28/2002	43 CFR 8341.1(d)	52	W\$2000	SWASEY D	OHV - REGISTRATIO
6/28/2002	43 CFR 8341.1(d)	52	W	SWASEY D	OHV - INSURANCE
6/28/2002	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATE A HAZARD
6/28/2002	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATE A HAZARD
6/28/2002	43 CFR 8365.1-4(a)(2)	70	NONE	SWASEY D	CREATE A HAZARD
7/6/2002	43 CFR 8365.1-6	62	F\$150	SWASEY D	DUMPING REFUSE
7/7/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
7/7/2002	43 CFR 9212.1(d)	69	F\$270	SWASEY D	ABANDONED FIRE
7/19/2002	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - LIC. PLATE LI
7/19/2002	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
7/27/2002	43 CFR 8365.1-6	62	DONATION \$1	SWASEY D	DUMPING REFUSE
8/17/2002	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
9/7/2002	43 CFR 4140.1(b)(6)	63	F\$ 50	SWASEY D	LITTERING
9/23/2002	43 CFR 8365.1-2(b)	68	NONE	SWASEY D	UNATTENDED PROP
10/5/2002	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
10/5/2002	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING
10/5/2002	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING
10/7/2002	43 CFR 8364.1(d)	70	F\$150	SWASEY D	VIOL CLOS ORD/SH
10/18/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING

10/18/2002	43 CFR 8364.1(d)	53	F\$150	SWASEY D	CLOSURE ORDER/V
10/18/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/18/2002	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/18/2002	43 CFR 8364.1(d)	53	F\$100	SWASEY D	CLOSURE ORDER/V
10/18/2002	43 CFR 8364.1(d)	53	NONE	SWASEY D	CLOSURE ORDER/V
10/19/2002	43 CFR 8365.1-4(a)(2)	44	NONE	SWASEY D	CREATE NUISANCE/
11/6/2002	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
11/6/2002	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING
11/6/2002	43 CFR 4140.1(b)(6)	63	F\$100	SWASEY D	LITTERING
11/16/2002	43 CFR 8364.1(d)	53	NONE	SWASEY D	CLOSURE VEHICLE/
11/16/2002	43 CFR 4140.1(b)(6)	63	F\$ 50 + CC \$2	SWASEY D	LITTERING
12/3/2002	43 CFR 8365.1-2(a)	64	F\$ 50 + CC \$2	SWASEY D	EXCEED CAMP LIMIT
12/7/2002	43 CFR 8364.1(d)	53	F\$150	SWASEY D	CLOSURE ORDER/V
12/7/2002	43 CFR 8364.1(d)	53	F\$150	SWASEY D	CLOSURE ORDER/V
12/7/2002	43 CFR 8364.1(d)	53	NONE	SWASEY D	CLOSURE ORDER/V
1/11/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
1/11/2003	43 CFR 8365.1-6	52	F\$150	SWASEY D	OPEN CONTAINER
1/26/2003	43 CFR 8341.1(f)(4)	69	NONE	SWASEY D	CAUSE ENVIR. DAM
2/2/2003	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - INSURANCE
2/2/2003	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
2/9/2003	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV - HELMET
2/23/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
2/23/2003	43 CFR 4140.1(b)(6)	63	F\$250	SWASEY D	LITTERING
2/23/2003	43 CFR 4140.1(b)(4)	41	F\$150	SWASEY D	DAMAGE GOV'T PRO
2/23/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
2/23/2003	43 CFR 4140.1(b)(4)	41	F\$250	SWASEY D	DAMAGE GOV'T PRO
2/28/2003	43 CFR 8365.1-1(b)(4)	62	W\$375	SWASEY D	DISPOSE OF WASTE
2/28/2003	43 CFR 8365.1-1(b)(4)	62	W\$375	SWASEY D	DISPOSE OF WASTE
2/28/2003	43 CFR 8365.1-1(b)(4)	62	F\$125	SWASEY D	DISPOSE OF WASTE
2/28/2003	43 CFR 8365.1-1(b)(4)	62	W\$375	SWASEY D	DISPOSE OF WASTE
3/2/2003	43 CFR 8341.1(d)	52	F\$103	SWASEY D	OHV - RIDING DOUB
3/8/2003	43 CFR 4140.1(b)(4)	41	F\$250	SWASEY D	DAMAGE GOV'T PRO
3/8/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
3/14/2003	CVC 23152(a)	52	NONE	SWASEY D	DUI

3/14/2003	43 CFR 8341.1(d)	52	NONE	SWASEY D	OHV/REGISTRATION
3/14/2003	43 CFR 8341.1(f)(4)	53	F\$100 + CC \$2	SWASEY D	OHV/CAUSE ENVIR.
3/22/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
3/23/2003	43 CFR 8365.1-1(b)(4)	62	F\$100 + CC \$2	SWASEY D	DISPOSE OF WASTE
3/23/2003	43 CFR 8365.1-1(b)(4)	62	F\$500	SWASEY D	DISPOSE OF WASTE
3/23/2003	43 CFR 8341.1(f)(4)	69	F\$200	SWASEY D	CAUSE ENVIR. DAM
3/23/2003	43 CFR 8341.1(f)(4)	69	F\$50 + CC \$25	SWASEY D	CAUSE ENVIR. DAM
3/23/2003	43 CFR 8341.1(f)(4)	69	NONE	SWASEY D	CAUSE ENVIR. DAM
3/23/2003	43 CFR 8341.1(f)(4)	69	NONE	SWASEY D	CAUSE ENVIR. DAM
3/29/2003	43 CFR 8364.1(d)	54	F\$250	SWASEY D	CLOSURE ORDER/V
4/6/2003	43 CFR 4140.1(b)(4)	41	NONE	SWASEY D	DAMAGE GOV'T PRO
4/12/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
5/5/2003	43 CFR 8341.1(d)	68	F\$211	SWASEY D	OHV/ENVIR. DAMAG
5/8/2003	43 CFR 4140.1(b)(6)	63	F\$500	SWASEY D	LITTERING
5/11/2003	43 CFR 4140.1(b)(4)	42	F\$250	SWASEY D	DAMAGE GOV'T PRO
5/11/2003	43 CFR 9264.1(h)	70	DISMISSED	SWASEY D	HUNTING W/O LICEN
5/26/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
5/26/2003	43 CFR 8364.1(d)	54	F\$150	SWASEY D	OHV - CLOSED ARE
5/26/2003	16 USC 703	69	F\$600	SWASEY D	SHOOT MIG. BIRD
5/31/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
5/31/2003	43 CFR 4140.1(b)(6)	63	F-PD	SWASEY D	LITTERING
5/31/2003	43 CFR 4140.1(b)(6)	63	W\$450	SWASEY D	LITTERING
8/12/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
8/12/2003	43 CFR 9212.1(h)	59	F\$100	SWASEY D	FIRE PREV. ORDER
8/17/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
8/22/2003	43 CFR 8365.1-4(b)(2)	38	W\$2000	SWASEY D	POSS. CONTROL SU
8/22/2003	CAVC 10851	70	NONE	SWASEY D	POSS. STOLEN VEH.
9/19/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
9/19/2003	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/19/2003	43 CFR 4140.1(b)(6)	63	NONE	SWASEY D	LITTERING
9/26/2003	43 CFR 9212.1(h)	69	NONE	SWASEY D	ILLEGAL FIRE
10/11/2003	43 CFR 8364.1(d)	54	F\$100	SWASEY D	VIOL. CLOSURE OR
10/12/2003	43 CFR 4140.1(b)(6)	63	F\$150	SWASEY D	LITTERING
10/12/2003	43 CFR 8365.1-4(a)(2)	61	NONE	SWASEY D	CREATE A HAZARD

10/12/2003	43 CFR 4140.1(b)(4)	41	NONE	SWASEY D	DAMAGE GOV'T PRO
10/26/2003	43 CFR 4140.1(b)(6)	63	F\$ 75	SWASEY D	LITTERING
11/15/2003	43 CFR 8364.1(d)	54	F\$150	SWASEY D	VIOL. CLOSURE OR
11/15/2003	43 CFR 8364.1(d)	54	NONE	SWASEY D	VIOL. CLOSURE OR
12/5/2003	43 CFR 8341.1(d)	52	F\$ 70 + CC \$2	SWASEY D	OHV - REGISTRATIO
12/5/2003	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - INSURANCE
12/6/2003	43 CFR 8364.1(d)	69	F\$150	SWASEY D	CLOSURE ORDER/V
12/6/2003	43 CFR 8364.1(d)	69	NONE	SWASEY D	CLOSURE ORDER/V
12/7/2003	43 CFR 8364.1(d)	69	REF TO JUV P	SWASEY D	CLOSURE ORDER/S
12/7/2003	43 CFR 8364.1(d)	69	REF TO JUV.P	SWASEY D	CLOSURE ORDER/S
12/7/2003	43 CFR 8341.1(d)	52	F\$ 70 + CC \$2	SWASEY D	OHV - REGISTRATIO
12/7/2003	43 CFR 8341.1(d)	52	DISMISSED	SWASEY D	OHV - REGISTRATIO
12/22/2003	43 CFR 4140.1(b)(6)	62	CONT 03/16/0	SWASEY D	LITTERING
12/22/2003	43 CFR 8364.1(d)	53	F\$150	SWASEY D	VIOL CLOSURE/VEHI
12/22/2003	43 CFR 8364.1(d)	53	NONE	SWASEY D	VIOL CLOSURE/VEHI
12/22/2003	43 CFR 8341.1(d)	52	CONT 03/16/0	SWASEY D	DMV - REGISTRATIO
12/22/2003	43 CFR 8341.1(d)	52	CONT 03/16/0	SWASEY D	DMV - INSURANCE
12/28/2003	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
1/6/2004	43 CFR 8364.1(d)	53	F\$150	SWASEY D	VIOL. CLOSURE OR
1/6/2004	43 CFR 8364.1(d)	53	NONE	SWASEY D	VIOL. CLOSURE OR
1/9/2004	43 CFR 8341.1(d)	52	NONE	SWASEY D	DMV/REC. STOLEN
1/23/2004	43 CFR 8341.1(d)	52	F\$150	SWASEY D	OHV - CAUSE ENVIR
2/3/2004	43 CFR 8364.1(d)	54		SWASEY D	VIOL. CLOSURE OR
2/3/2004	43 CFR 8341.1(d)	52		SWASEY D	DMV/INSURANCE
2/3/2004	43 CFR 8364.1(d)	54	NONE	SWASEY D	VIOL. CLOSURE OR
2/8/2004	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
2/8/2004	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
2/8/2004	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
2/8/2004	43 CFR 4140.1(b)(6)	63		SWASEY D	LITTERING
2/8/2004	43 CFR 8365.1-6	70		SWASEY D	OPEN CONTAINER
2/25/2004	43 CFR 8365.1-1(b)(4)	62	NONE	SWASEY D	DISPOSE OF WASTE
3/23/2004	43 CFR 8341.1(d)	52		SWASEY D	DMV/REGISTRATION

APPENDIX 3

Road and Trail Maintenance Standards

Maintenance Level - Trails

The assigned maintenance level reflects the appropriate level of maintenance required to meet management objectives.

Level 1 Trails closed to motorized and non-motorized use. This level is the minimum maintenance required to protect adjacent lands and resource values. The objectives may be to remove these trails from the trail system.

(Minimum standards for Level 1) - Emphasis is given to maintaining drainage and runoff patterns as needed to protect adjacent lands. Brushing and removal of hazards are not performed unless trail drainage is being adversely affected causing erosion. Closure devices are maintained.

Level 2 Low use trail with little or no contact between parties. Little or no visitor use management. Visitors may encounter obstructions like brush and deadfall.

(Minimum standards for Level 2) - Repairs will be done at the beginning of the season to prevent environmental damage and maintain access. Emphasis is given to maintaining drainage and mitigating hazards. The trail may be signed "Not regularly Maintained". Major repair may not be done for several seasons.

Level 3 Moderate use trail with visitor use on a seasonal/and or peak use period with frequent contact between parties. Trail management is conducted with occasional visitor use patrols. Visitors are not likely to encounter obstructions.

(Minimum standards for Level 3) - Major repairs shall be completed annually. Maintenance shall be scheduled two to three times per season, if required, to repair the trail to prevent environmental damage and to maintain access. Trail is kept in good condition.

Level 4 High use trail during specific times of the year with high frequencies of contact between parties. Regularly scheduled visitor use patrol and management.

(Minimum standards for Level 4) - Scheduled maintenance shall occur frequently (three or four times) during the use season. Trail condition and accessibility for persons with disabilities are major concerns. Significant repairs shall be completed within 10 workdays.

Level 5 A special high use trail with routine high visitor use, patrols and management.

(Minimum standards for Level 5) - Has a scheduled maintenance program. Trail condition and accessibility for persons with disabilities are a major concern. Significant repairs shall be completed within 2-3 workdays.

Maintenance Levels - Roads

BLM Road Maintenance Levels - The assigned maintenance level reflects the appropriate maintenance that best fits the Transportation Management Objectives for planned management activities. Roads will be prioritized for maintenance needs or may be maintained at lower levels depending upon funding.

Level 1 Roads where minimum maintenance is required to protect adjacent lands and resource values. These roads are no longer needed and are closed to traffic; the objective is to remove these roads from the transportation system.

(Minimum standards for Level 1) - Emphasis is given to maintaining drainage and runoff patterns as needed to protect adjacent lands. Grading, brushing, or slide removal is not performed unless roadbed drainage is being adversely affected, causing erosion. Closure and traffic restrictive devices are maintained.

Level 2 Roads where the management objectives require the road to be opened for limited administrative traffic. Typically, these roads are passable by high clearance vehicles.

(Minimum standards for Level 2) - Drainage structures are to be maintained as needed. Grading is conducted as necessary to correct drainage problems. Brushing is conducted as needed to allow administrative access. Slides may be left in place provided they do not adversely affect drainage.

Level 3 Roads where management objectives require the road to be open seasonally or year-round for commercial, recreation, or high volume administrative access. Typically, these roads are natural or aggregate surfaced, but may include low use bituminous surfaced roads. These roads have defined cross section with drainage structures (e.g., rolling dips, culverts, or ditches). These roads may be negotiated by passenger cars traveling at prudent speeds. User comfort and convenience are not considered a high priority.

(Minimum standards for Level 3) - Drainage structures are to be maintained as needed. Grading is conducted to provide a reasonable level of riding comfort at prudent speeds for the road conditions. Brushing is conducted as needed to improve sight distance. Slides adversely affecting drainage receive high priority for removal, otherwise they will be removed on a scheduled basis.

Level 4 Roads where management objectives require the road to be open all year and to connect major features (recreation sites, local road systems, administrative sites, etc.) to County, State, or Federal roads. Typically, these roads are single or double lane, aggregate, or bituminous surface, with a higher volume of commercial and recreational traffic than administrative traffic.

(Minimum standards for Level 4) - The entire roadway is maintained at least annually, although a preventative maintenance program may be established. Problems are repaired as discovered. These roads may be closed or have limited access due to snow conditions.

Level 5 Roads where management objectives require the road to be open all year and are the highest traffic volume roads of the transportation system.

(Minimum standards for Level 5) - The entire roadway is maintained at least annually and a preventative maintenance program is established. Problems are repaired as discovered. These roads may be closed or have limited access due to snow conditions.

APPENDIX 4



Dr. Eric Ritter
Bureau of Land Management
355 Hemsted Drive
Redding, CA 96002

Columbia Analytical Services Report
Bureau of Land Management
D0105676/D5676

October 10, 2001

Submitted by:



Robert DeMarr
Project Manager/Client Services

This report contains a total of 19 pages.

0001

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CAS Lab Reference No.: D5676

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Current CAS Redding Accreditation Programs

Federal and National Programs

- U.S Air Force, Air Force Center for Environmental Excellence (AFCEE)
Approved laboratory for Wastewater and Hazardous Waste
- U.S. Army Corps of Engineers – MRD, HTRW Mandatory Center of Expertise
Validated for Wastewater and Hazardous Waste
- Department of the Navy, Naval Facilities Engineering Service Center (NFESC)
Approved laboratory for Wastewater and Hazardous Waste

State and Local Programs

- State of Alaska, Department of Environmental Conservation
Approved UST Laboratory
Lab ID# UST-001
- State of Arizona, Department of Health Services
Approved laboratory for Hazardous Waste
Lab ID# AZ0604
- State of Arkansas, Department of Environmental Quality
Approved laboratory for Wastewater and Hazardous Waste
Lab ID# None
- State of California, Department of Health Services, Environmental Laboratory Accreditation Program (ELAP)
Approved laboratory for Drinking Water, Wastewater and Hazardous Waste
Lab ID# 1364
- State of California, Department of Health Services, National Environmental Laboratory Accreditation Program (NELAP)
Approved laboratory for Drinking Water, Wastewater and Hazardous Waste
Lab ID# 01105CA
- State of Florida, Department of Health (NELAP)
Approved Environmental Testing Laboratory for Wastewater and Hazardous Waste
Lab ID# E87203
- State of Kansas, Department of Health and Environment (NELAP)
Approved laboratory for Hazardous Waste
Lab ID# E-10323
- State of Massachusetts, Department of Environmental Protection
Approved laboratory for Drinking Water, Wastewater
Lab ID# M-CA025
- State of Oklahoma, Department of Environmental Quality
General Water Quality/Sludge Testing Laboratory
Lab ID# 9708
- State of Oregon, Department of Human Resources, Health Division (ORELAP)
Approved laboratory for Drinking Water, Wastewater, and Hazardous Waste
Lab ID# CA200004

Current CAS Redding Accreditation Programs (Continued)

- State of Utah, Department of Health, Division of Laboratory Services (NELAP)
Approved laboratory for Wastewater and Hazardous Waste
Lab ID# QUAL1
- State of Washington, Department of Ecology, Environmental Laboratory Accreditation Program
Approved laboratory for Wastewater and Hazardous Waste
Lab ID# C037
- State of Wisconsin, Department of Ecology
Approved laboratory for Wastewater and Hazardous Waste
Lab ID# 999767340

Inorganic Data Qualifiers Cations

C (Concentration) Qualifier:

- B** -- The reported value obtained was less than the CRDL, but greater than or equal to the MDL/IDL.
- U** -- The value was less than the MDL/IDL or was not detected.

Q Qualifier:

- E** -- The reported value is estimate because of interference.
- M** -- Duplicate injection precision was not met. (Two analyses of the sample did not agree).
- N** -- Spiked sample recovery not within control limits.
- S** -- The reported value was determined by the Method of Standard Additions (MSA).
- J** -- Post digestion spike for Graphite Furnace AA analyses is out of control limits (85% - 115%), while sample absorbance is less than 50% of spike absorbance.
- *** -- Duplicate analysis not within control limits.
- +** -- Correlation coefficient for the MSA is less than 0.995.

M (Method) Qualifier:

- P** -- ICP
- A** -- Flame AA
- F** -- Furnace AA
- CV** -- Cold Vapor
- AV** -- Automated Cold Vapor
- NR** -- Analyte was not required
- C** -- Manual spectrophotometric

RRL (Reliable Reporting Limit):

- RRL** -- The reliable reporting limit was established to qualify analytical results for which no CRDL was Available, or did not apply. The RRL is a concentration approximately four times the Method Detection Limit (MDL).

INORGANIC ANALYSIS METHODS

Check appropriate analysis method(s) and/or sample preparation method(s)

CAS Lab Reference No. D5676

Metals/Cyanide Analyses

Parameter	Method	Method Source
Acid Digestion	<input type="checkbox"/> 3005A	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 3010A	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 3020A	SW-846, 3rd Ed.
.....	<input checked="" type="checkbox"/> 3050B	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 200.2	EPA-600/R94/111. 05/94
.....	<input type="checkbox"/> CLP	SOW ILM02.1
Antimony	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 204.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7041 (GFAA)	SW-846, 3rd Ed.
Arsenic	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 206.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7060A (GFAA)	SW-846, 3rd Ed.
Cadmium	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 213.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7131A (GFAA)	SW-846, 3rd Ed.
Chromium	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 218.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7191 (GFAA)	SW-846, 3rd Ed.
Copper	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 220.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7211 (GFAA)	SW-846, 3rd Ed.
Lead	<input type="checkbox"/> 200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/> 239.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/> 6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/> 7421 (GFAA)	SW-846, 3rd Ed.

Parameter		Method	Method Source
Mercury	<input type="checkbox"/>	245.1 (CVAA)/Liquid ..	EPA MCAWW
.....	<input type="checkbox"/>	245.5 (CVAA)/Solid ...	EPA MCAWW
.....	<input type="checkbox"/>	7470A (CVAA)/Liquid ..	SW-846, 3rd Ed.
.....	<input checked="" type="checkbox"/>	7471A (CVAA)/Solid ...	SW-846, 3rd Ed.
Selenium	<input type="checkbox"/>	200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/>	270.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/>	6010B (ICP)	SW-846, 3rd Ed.
.....	<input checked="" type="checkbox"/>	7740 (GFAA)	SW-846, 3rd Ed.
Silver	<input type="checkbox"/>	200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/>	272.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/>	6010B (ICP)	SW-846, 3rd Ed.
.....	<input type="checkbox"/>	7761 (GFAA)	SW-846, 3rd Ed.
Thallium	<input type="checkbox"/>	200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input type="checkbox"/>	279.2 (GFAA)	EPA-600/4-79-020, 03/83
.....	<input type="checkbox"/>	6010B (ICP)	SW-846, 3rd Ed.
.....	<input checked="" type="checkbox"/>	7841 (GFAA)	SW-846, 3rd Ed.
All Other Metals	<input type="checkbox"/>	200.7 (ICP)	EPA-600/R94/111, 05/94
.....	<input checked="" type="checkbox"/>	6010B (ICP)	SW-846, 3rd Ed.
TCLP Extraction	<input type="checkbox"/>	1311	SW-846, 3rd Ed.
SPLP Extraction	<input type="checkbox"/>	1312	SW-846, 3rd Ed.
STLC Extraction	<input type="checkbox"/>	Waste Extraction Test (WET) Title 22, CA Code of Reg.	(CCR)
Cyanide	<input type="checkbox"/>	335.2 CLP-M (Midi Dist.)	SOW ILM02.1

Note:

Each of the digestion methods applies only to samples analyzed by the corresponding analytical method.

Sample ID Cross-reference Table

CAS Lab Sample ID	Client Sample ID	Receive Date	Collect Date	Sample Matrix	Additional Description
FS = Field Sample					
D5676001	FS SAMPLE #1	09/19/01	09/19/01 00:00	Soil	
D5676002	FS SAMPLE #2	09/19/01	09/19/01 00:00	Soil	
D5676003	FS SAMPLE #3	09/19/01	09/19/01 00:00	Soil	
D5676004	FS SAMPLE #4	09/19/01	09/19/01 00:00	Soil	
D5676005	FS SAMPLE #5	09/19/01	09/19/01 00:00	Soil	

The above lab sample ID's and cross reference information apply to samples as received by the laboratory. Modifiers to the lab sample ID may be added for internal tracking purposes. Any modified sample ID will be reflected in the appropriate case narrative only.

CATIONS

Case Narrative
Cations

CAS Lab Reference No./SDG.: D5676
Project: Bureau of Land Management

I. RECEIPT

No exceptions were encountered unless a Sample Receipt Exception Report is attached to the Chain-of-Custody included with this data package.

II. HOLDING TIMES

All holding times were met.

III. METHOD

The method used is cited on the attached Inorganics Analysis Methods sheet.

IV. PREPARATION

Sample preparation proceeded normally, if applicable.

V. ANALYSIS

A. Calibration: All acceptance criteria were met.

B. Blanks: All acceptance criteria were met.

C. ICP Interference Check Samples: All acceptance criteria were met.

D. Spikes: The percent recoveries of Selenium in the matrix spike and matrix spike duplicate, at 62.4% and 67.3%, did not meet the acceptance criteria of 75% to 125%. A post digestion spike was performed with a percent recovery of 61.2%, which did not meet the acceptance criteria of 85% to 115%. The Selenium sample results were determined by a single-point method of standard additions.

E. Duplicates: All acceptance criteria were met.

F. Laboratory Control Samples: All acceptance criteria were met.

G. ICP Serial Dilution: All acceptance criteria were met.

H. Other: Results are reported to the RL and on a wet weight basis.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and CAS, both technically and for completeness, except for the conditions noted above. Release of the data contained in this hardcopy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

SIGNED: Ricky Jensen
Ricky D. Jensen
Resource Chemist

DATE: 10/9/01

Report of Analytical Results

Client Sample ID: SAMPLE #1
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: 09/19/01 00:00 (Wed)
Date Received: 09/19/01 15:20 (Wed)

Reference No: D5676
Lab Sample ID: D5676001

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Date/Time Level of Analysis	Analytical Method(s)
CATIONS				
Antimony, TTLC	< 9.0	mg/Kg wet 9.0	10/03/01 12:37	SW6010/EPA200.7
Arsenic, TTLC	< 9.0	mg/Kg wet 9.0	10/03/01 12:37	SW6010/EPA200.7
Barium, TTLC	7.8	mg/Kg wet 1.0	10/03/01 12:37	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet 1.0	10/03/01 12:37	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet 1.0	10/03/01 12:37	SW6010/EPA200.7
Chromium, TTLC	10.8	mg/Kg wet 2.0	10/03/01 12:37	SW6010/EPA200.7
Cobalt, TTLC	4.5	mg/Kg wet 3.0	10/03/01 12:37	SW6010/EPA200.7
Copper, TTLC	6.7	mg/Kg wet 2.0	10/03/01 12:37	SW6010/EPA200.7
Lead, TTLC	< 10.0	mg/Kg wet 10.0	10/03/01 12:37	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet 0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet 3.0	10/03/01 12:37	SW6010/EPA200.7
Nickel, TTLC	5.3	mg/Kg wet 4.0	10/03/01 12:37	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet 0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet 2.0	10/03/01 12:37	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet 0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	16.6	mg/Kg wet 2.0	10/03/01 12:37	SW6010/EPA200.7
Zinc, TTLC	11.3	mg/Kg wet 4.0	10/03/01 12:37	SW6010/EPA200.7

(17521)

Report of Analytical Results

Client Sample ID: SAMPLE #2
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: 09/19/01 00:00 (Wed)
Date Received: 09/19/01 15:20 (Wed)

Reference No: D5676
Lab Sample ID: D5676002

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Level	Date/Time of Analysis	Analytical Method(s)
CATIONS					
Antimony, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 12:41	SW6010/EPA200.7
Arsenic, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 12:41	SW6010/EPA200.7
Barium, TTLC	12.5	mg/Kg wet	1.0	10/03/01 12:41	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:41	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:41	SW6010/EPA200.7
Chromium, TTLC	8.3	mg/Kg wet	2.0	10/03/01 12:41	SW6010/EPA200.7
Cobalt, TTLC	3.8	mg/Kg wet	3.0	10/03/01 12:41	SW6010/EPA200.7
Copper, TTLC	10.5	mg/Kg wet	2.0	10/03/01 12:41	SW6010/EPA200.7
Lead, TTLC	33.4	mg/Kg wet	10.0	10/03/01 12:41	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet	0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 12:41	SW6010/EPA200.7
Nickel, TTLC	< 4.0	mg/Kg wet	4.0	10/03/01 12:41	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet	0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:41	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet	0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	16.8	mg/Kg wet	2.0	10/03/01 12:41	SW6010/EPA200.7
Zinc, TTLC	15.0	mg/Kg wet	4.0	10/03/01 12:41	SW6010/EPA200.7

(17521)

Report of Analytical Results

Client Sample ID: SAMPLE #3
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: 09/19/01 00:00 (Wed)
Date Received: 09/19/01 15:20 (Wed)

Reference No: D5676
Lab Sample ID: D5676003

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Level	Date/Time of Analysis	Analytical Method(s)
CATIONS					
Antimony, TTLC	287	mg/Kg wet	9.0	10/03/01 12:45	SW6010/EPA200.7
Arsenic, TTLC	53.6	mg/Kg wet	9.0	10/03/01 12:45	SW6010/EPA200.7
Barium, TTLC	15.4	mg/Kg wet	1.0	10/03/01 12:45	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:45	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:45	SW6010/EPA200.7
Chromium, TTLC	11.4	mg/Kg wet	2.0	10/03/01 12:45	SW6010/EPA200.7
Cobalt, TTLC	3.2	mg/Kg wet	3.0	10/03/01 12:45	SW6010/EPA200.7
Copper, TTLC	206	mg/Kg wet	2.0	10/03/01 12:45	SW6010/EPA200.7
Lead, TTLC	10400	mg/Kg wet	10.0	10/03/01 12:45	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet	0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 12:45	SW6010/EPA200.7
Nickel, TTLC	4.8	mg/Kg wet	4.0	10/03/01 12:45	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet	0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:45	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet	0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	12.4	mg/Kg wet	2.0	10/03/01 12:45	SW6010/EPA200.7
Zinc, TTLC	33.2	mg/Kg wet	4.0	10/03/01 12:45	SW6010/EPA200.7

(17521)

Report of Analytical Results

Client Sample ID: SAMPLE #4
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: 09/19/01 00:00 (Wed)
Date Received: 09/19/01 15:20 (Wed)

Reference No: D5676
Lab Sample ID: D5676004

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Level	Date/Time of Analysis	Analytical Method(s)
CATIONS					
Antimony, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 13:03	SW6010/EPA200.7
Arsenic, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 13:03	SW6010/EPA200.7
Barium, TTLC	52.8	mg/Kg wet	1.0	10/03/01 13:03	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 13:03	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 13:03	SW6010/EPA200.7
Chromium, TTLC	26.8	mg/Kg wet	2.0	10/03/01 13:03	SW6010/EPA200.7
Cobalt, TTLC	13.3	mg/Kg wet	3.0	10/03/01 13:03	SW6010/EPA200.7
Copper, TTLC	46.2	mg/Kg wet	2.0	10/03/01 13:03	SW6010/EPA200.7
Lead, TTLC	711	mg/Kg wet	10.0	10/03/01 13:03	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet	0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 13:03	SW6010/EPA200.7
Nickel, TTLC	11.6	mg/Kg wet	4.0	10/03/01 13:03	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet	0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 13:03	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet	0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	39.6	mg/Kg wet	2.0	10/03/01 13:03	SW6010/EPA200.7
Zinc, TTLC	52.3	mg/Kg wet	4.0	10/03/01 13:03	SW6010/EPA200.7

(17521)

Report of Analytical Results

Client Sample ID: SAMPLE #5
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: 09/19/01 00:00 (Wed)
Date Received: 09/19/01 15:20 (Wed)

Reference No: D5676
Lab Sample ID: D5676005

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Level	Date/Time of Analysis	Analytical Method(s)
CATIONS					
Antimony, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 13:07	SW6010/EPA200.7
Arsenic, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 13:07	SW6010/EPA200.7
Barium, TTLC	8.2	mg/Kg wet	1.0	10/03/01 13:07	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 13:07	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 13:07	SW6010/EPA200.7
Chromium, TTLC	29.7	mg/Kg wet	2.0	10/03/01 13:07	SW6010/EPA200.7
Cobalt, TTLC	4.5	mg/Kg wet	3.0	10/03/01 13:07	SW6010/EPA200.7
Copper, TTLC	7.3	mg/Kg wet	2.0	10/03/01 13:07	SW6010/EPA200.7
Lead, TTLC	< 10.0	mg/Kg wet	10.0	10/03/01 13:07	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet	0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 13:07	SW6010/EPA200.7
Nickel, TTLC	8.9	mg/Kg wet	4.0	10/03/01 13:07	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet	0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 13:07	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet	0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	23.9	mg/Kg wet	2.0	10/03/01 13:07	SW6010/EPA200.7
Zinc, TTLC	16.2	mg/Kg wet	4.0	10/03/01 13:07	SW6010/EPA200.7

(17521)

Report of Analytical Results

Client Sample ID: METHOD BLANK
Sample Description: None
Sample Matrix: Soil
Site: N/A

Date Collected: None
Date Received: None

Reference No: LABQC
Lab Sample ID: METHOD BLANK

CATEGORY NAME Analytical Parameter	Result	Units	Reporting Level	Date/Time of Analysis	Analytical Method(s)
CATIONS					
Antimony, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 12:06	SW6010/EPA200.7
Arsenic, TTLC	< 9.0	mg/Kg wet	9.0	10/03/01 12:06	SW6010/EPA200.7
Barium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:06	SW6010/EPA200.7
Beryllium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:06	SW6010/EPA200.7
Cadmium, TTLC	< 1.0	mg/Kg wet	1.0	10/03/01 12:06	SW6010/EPA200.7
Chromium, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:06	SW6010/EPA200.7
Cobalt, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 12:06	SW6010/EPA200.7
Copper, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:06	SW6010/EPA200.7
Lead, TTLC	< 10.0	mg/Kg wet	10.0	10/03/01 12:06	SW6010/EPA200.7
Mercury, TTLC	< 0.08	mg/Kg wet	0.08	09/27/01 00:00	SW7471
Molybdenum, TTLC	< 3.0	mg/Kg wet	3.0	10/03/01 12:06	SW6010/EPA200.7
Nickel, TTLC	< 4.0	mg/Kg wet	4.0	10/03/01 12:06	SW6010/EPA200.7
Selenium, TTLC	< 0.40	mg/Kg wet	0.40	10/02/01 00:00	SW7740
Silver, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:06	SW6010/EPA200.7
Thallium, TTLC	< 0.50	mg/Kg wet	0.50	10/01/01 00:00	SW7841
Vanadium, TTLC	< 2.0	mg/Kg wet	2.0	10/03/01 12:06	SW6010/EPA200.7
Zinc, TTLC	< 4.0	mg/Kg wet	4.0	10/03/01 12:06	SW6010/EPA200.7

(17521)

CHAIN OF CUSTODY DOCUMENTATION

COC#

CHAIN OF CUSTODY/LABORATORY ANALYSIS REQUEST FORM



Services
An Employee-Owned Company
5090 Caterpillar Road • Redwood City, CA 94063
www.caslab.com

5500 Calermillar Road • Redding, CA 96003 • (530) 244-5227 • 800-

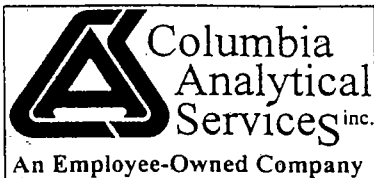
1-695-7222 x10 • FAX (530) 244-4109

PAGE _____ OF _____

10011101

1

Project Name		Project Number		ANALYSIS REQUESTED (Include Method Number and Container Preservative)										PRESERVATIVE		NUMBER OF CONTAINERS					PRESERVATIVE KEY												
Project Manager		Report CC																															
Company/Address																																	
Swasey		Eric Riter		BLM										355 Hemsted Dr.																			
Redding, CA		96002																															
Phone #		530-224-2100		FAX#										530-224-2172																			
Sample's Signature		Eric W. Riter																															
CLIENT SAMPLE ID		LAB ID		SAMPLING DATE		TIME		MATRIX																									
Sample #1		1		9/19		AM		Soilment																									
Sample #2		2		↓		↓		↓																									
Sample #3		3		↓		↓		↓																									
Sample #4		4		↓		↓		↓																									
Sample #5		5		↓		↓		↓																									
SPECIAL INSTRUCTIONS/COMMENTS		tag ver. 7/20 9-19-01																															
MICRO-SCREEN FIRST ?		REMOVE PEBBLES FIRST and any obvious plant parts																															
Sample 2 and 3 - Remove any piece of lead bullets																																	
See OAPP <input type="checkbox"/>		SAMPLER RECEIPT: CONDITION/COOLER TEMP: _____																															
RELINQUISHED BY		RECEIVED BY																															
Signature		Signature																															
Printed Name		Printed Name																															
Firm		Firm																															
Date/Time		Date/Time																															



5090 Caterpillar Road
Redding, CA 96003

COOLER RECEIPT FORM

Project/Client BLM Work Order D010 5676

1. Cooler(s)/Sample(s) received on: 9/19/01 Shipped via: HAND

Shipping Bill # (s): N/A

2. Cooler(s) / Samples screened by: BSullivan ☒ Acceptable ☐ Rejected

3. Custody seals on outside of cooler. YES ☒ NO ☐ N/A
If yes, where? Front _____ Rear _____ Lt Side _____ Rt Side _____

Seals intact. YES ☐ NO ☐

COOLER/SAMPLE PROCESSING

4. Sample Processing/Tagging by: [Signature]

5. Cooler(s)/Sample(s) Temp.'s 6°C _____
(or) _____
Temp. Blank (if present) _____

6. Type of packing material present: ICE - SNAKE SKIN - BUBBLE WRAP

7. Custody papers properly filled out (ink, signed, dated, released, etc.)? ☒ YES ☐ NO

8. Containers arrived in good condition (unbroken, leaking, etc.)? ☒ YES ☐ NO

9. Container labels complete (i.e. analysis, preservation, date/time, etc.)? ☒ YES ☐ NO

10. Container labels and tags agree with custody papers? ☒ YES ☐ NO

11. Correct types of containers used for the tests indicated? ☒ YES ☐ NO

a.) Adequate sample received? If not, note on Exception Report. ☒ YES ☐ NO

12. Containers supplied by: ☒ CAS ☐ Other

13. Preserved containers received with the appropriate preservative? YES ☐ NO ☒ N/A

pH: _____ (or) See pH log.

14. VOA vials checked for absence of air bubbles? YES ☐ NO ☒ N/A

15. Soil samples transferred to the freezer: Date: _____ Time: _____ ☒ N/A

See Exception Report for discrepancies.

CA Title 22

TITLE 22. Social Security

Division 4.5. Environmental Health Standard for the Management of Hazardous Waste

Chapter 11. Identification and Listing of Hazardous Waste

Article 3. Characteristics of Hazardous Waste

§66261.24. Characteristic of Toxicity

§66261.24 Characteristic of Toxicity.

(a) A waste exhibits the characteristic of toxicity if representative samples of the waste have any of the following properties:

(1) when using the Toxicity Characteristic Leaching Procedure (TCLP), test Method 1311 in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, third edition and Updates (incorporated by reference in section 66260.11 of this division), the extracts from representative samples of the waste contain any of the contaminants listed in Table I of this section at a concentration equal to or greater than the respective value given in that table unless the waste is excluded from classification as a solid waste or hazardous waste or is exempted from regulation pursuant to 40 CFR section 261.4. Where the waste contains less than 0.5 percent filterable solids, the waste itself, after filtering using the methodology outlined in Method 1311, is considered to be the extract for the purposes of this section;

(A) a waste that exhibits the characteristic of toxicity pursuant to subsection (a)(1) of this section has the EPA Hazardous Waste Number specified in Table I of this section which corresponds to the toxic contaminant causing it to be hazardous;

(B) Table I -Maximum Concentration of Contaminants for the Toxicity Characteristic:

EPA		Chemical	
Hazardous		Abstracts	Regulatory
Waste		Service	Level
Number	Contaminant	Number	Mg/l
DOO4	Arsenic	7440-38-2	5.0
DOO5	Barium	7440-39-3	100.0
DOI8	Benzene	71-43-2	0.5
DOO6	Cadmium	7440-43-9	1.0
D019	Carbon tetrachloride	56-23-5	0.5

(2) it contains a substance listed in subsections (a)(2)(A) or (a)(2)(B) of this section at a concentration in milligrams per liter of waste extract, as determined using the Waste Extraction Test (WET) described in Appendix II of this chapter, which equals or exceeds its listed soluble threshold limit concentration or at a concentration in milligrams per kilogram in the waste which equals or exceeds its listed total threshold limit concentration;
 (A) Table II- List of Inorganic Persistent and Bioaccumulative Toxic Substances and Their Soluble Threshold Limit Concentration: (STLC) and Total Threshold Limit Concentration (TTLC) Values.

Substance ^{a, b}	STLC	TTLC
	mg/l	Wet-Weight mg/kg
Antimony and/or antimony compounds	15	500
Arsenic and/or arsenic compounds	5.0	500
Asbestos		1.0
Barium and/or barium compounds (excluding barite)	100	10,000 ^c
Beryllium and/or beryllium compounds	0.75	75
Cadmium and/or cadmium compounds	1.0	100
Chromium (VI) compounds	5	500
Chromium and/or chromium (III) compounds	5 ^d	2,500
Cobalt and/or cobalt compounds	80	8,000
Copper and/or copper compounds	25	2,500
Fluoride salts	180	18,000
Lead and/or lead compounds	5.0	1,000
Mercury and/or mercury compounds	0.2	20
Molybdenum and/or molybdenum compounds	350	3,500 ^e
Nickel and/or nickel compounds	20	2,000
Selenium and/or selenium compounds	1.0	100
Silver and/or silver compounds	5	500
Thallium and/or thallium compounds	7.0	700
Vanadium and/or vanadium compounds	24	2,400
Zinc and/or zinc compounds	250	5,000

^aSTLC and TTLC values are calculated on the concentrations of the elements, not the compounds.

APPENDIX 5

Fuels and Fire Goals Strategy

The vegetation in the Swasey planning area consists of Oak Woodland, Shrubland, and minor areas of Mixed Conifer. Historically, this type of vegetation in this area burned every 5-30 years in what is classified as a “low intensity” fire. A fire of this type burned close to the ground with very little vegetation mortality and helped to maintain a generally open stand structure. Due to fire suppression, a change in land practices, and society’s overall perception of fire as harmful, the vegetation is overgrown. Currently if a fire were to burn in this area there will be significant mortality of the vegetation, threats to lives and homes, and probable loss of key ecosystem components. A fuel management strategy of thinning the vegetation and conducting prescribed burns is needed to reduce the threat that a high intensity wildland fire will destroy this area.

Direction on how this should be completed was given in the 2001 National Fire Plan and the 10-Year Comprehensive Strategy of the Department of Interior, Department of Agriculture and state governors. This document was prepared in the aftermath of some of the worst fire seasons in history and is used as a guideline for conducting fuels management.

10-Year Comprehensive Strategy

This strategy reflects the views of a broad cross-section of governmental and nongovernmental stakeholders. It outlines a comprehensive approach to the management of wildland fire, hazardous fuels, and ecosystem restoration and rehabilitation on Federal and adjacent State, tribal, and private forest and range lands in the United States. This strategy emphasizes measures to reduce the risk to communities and the environment and provides an effective framework for collaboration to accomplish this. Congress directed the Secretaries of the Interior and Agriculture to work with the Governors to develop this strategy in the FY 2001 Interior and Related Agencies Appropriations Act (P.L. 106-291). The direction requires “close collaboration among citizens and governments at all levels,” which, by extension, includes a geographically diverse group of people, representing all levels of government, tribal interests, conservation and commodity groups, and community-based restoration groups. A set of core principles was developed to guide the identification of goals for this strategy. These principles include such concepts as collaboration, priority setting, and accountability. An open, collaborative process among multiple levels of government and a range of interests will characterize the fulfillment of this strategy. The end results sought by all stakeholders are healthier watersheds, enhanced community protection, and diminished risk and consequences of severe wildland fires. The primary **goals** of the 10-Year Comprehensive Strategy are:

- 1. Improve Prevention and Suppression*
- 2. Reduce Hazardous Fuels*
- 3. Restore Fire Adapted Ecosystems*
- 4. Promote Community Assistance*

Guiding Principle:

Hazardous Fuel Reduction – Prioritize hazardous fuels reduction where the negative impacts of wildland fire are greatest.

- Reduce the total number of acres at risk to severe wildland fire.
- Ensure communities most at risk in the wildland-urban interface receive priority for hazardous fuels treatment.
- Expand and improve integration of the hazardous fuels management program to reduce severe wildland fires to protect communities and the environment.
- Incorporate public health and environmental quality considerations in fire management activities undertaken for the hazardous fuels management program.
- Develop smoke management plans in conjunction with prescribed fire planning and implementation.
- Develop strategies to address fire-prone ecosystem problems that augment fire risk or threaten sustainability of these areas.
- Assure maintenance of areas improved by fuels treatment by managing activities permitted on the restored lands to maintain their resiliency.
- Conduct and utilize research to support the reduction of hazardous fuels in wildland urban interface communities and environments.
- Ensure local environmental conditions are factored into hazardous fuels treatment planning.

Reduce Hazardous Fuels

Actions

According to the 10-year Comprehensive Strategy (see www.fireplan.gov/FIRE.REPORT.1.pdf) goals 2-4 state:

- ***Prioritize hazardous fuels reduction where the negative impacts of wildland fire are greatest.***
- ***Restore healthy, diverse, and resilient ecological systems to minimize uncharacteristically severe fires on a priority watershed basis through long-term restoration.***
- ***Employ all appropriate means to stimulate industries that will utilize small-diameter, woody material resulting from hazardous fuel reduction activities, such as for biomass electric power, pulp and paper-making, and composite structural building materials.***

According to the report Protecting People and Sustaining Resources in Fire-Adapted Ecosystems a Cohesive Strategy, (see www.fireplan.gov/cohesive.htm) most forests and grasslands in the interior west and their associated species are fire-adapted. Some, known as “short interval” fire-adapted ecosystems, evolved from frequent, low-intensity fires that burned surface fuels.

Historically the planning area would be classified as a fire regime group 1, which is a fire of a low severity burning in the area every 0-35 years (see 1999 GAO report). A low intensity fire is one in which the fire can be fought using hand tools. This is further defined as a fire having flame lengths less than 4 feet. By sampling the planning area it was found that the majority of the stand is overgrown with trees and brush competing for limited space and nutrients. This would indicate that a significant fire event has not happened in quite some time and the result has been an over accumulation vegetation has grown that has competed for nutrients and suppressed regeneration from occurring. With this information we can conclude that there has been 3-10 fire return cycles missed. This would place this area in a condition Class 3 where fire frequencies have departed from historical frequencies by multiple return intervals. This results in dramatic

changes to one or more of the following: fire size, intensity, severity, and landscape patterns. Vegetation attributes have been significantly altered from their historical range (see 1999 GAO report). To clarify this point if a wildfire were to originate within or directly adjacent to this area, threats to both life and property can be anticipated. This can be attributed to the excessive amount of fuel accumulation both on the ground and standing. There are 3 things that contribute to the severity of a fire: weather, topography, and fuels. Obviously humans cannot directly change weather or topography but we can modify fuels. Another key point is the risk of an ignition. This area receives some of the highest recreation use on public lands and statistical fire causes are significantly contributed to humans.

REFERENCES CITED

U.S. General Accounting Office

1999 *Western National Forests, a Cohesive Strategy is Needed to Address Catastrophic Wildfire Threats*. Washington D.C.

GLOSSARY

Fire Regime – A generalized description of the role fire plays in an ecosystem. It is characterized by fire frequency, predictability, seasonality, intensity, duration, scale (patch size), as well as regularity or variability. Five combinations of fire frequency, expressed as fire return interval in fire severity, are defined:

Groups I and II include fire return intervals in the 0 – 35 year range. Group 1 includes Ponderosa pine, other long needle pine species, and dry site Douglas fir. Group II includes the drier grassland types, tall grass prairie, and some Pacific chaparral ecosystems.

Groups III and IV include fire return intervals in the 35-100+ year range. Group III includes interior dry site shrub communities such as sagebrush and chaparral ecosystems. Group IV includes lodgepole pine and jack pine.

Group V is the long interval (infrequent), stand replacement fire regime and includes temperate rain forest, boreal forest, and high elevation conifer species.

Condition Class – Based on coarse scale national data, Fire Condition Classes measure general wildfire risk as follows:

Condition Class 1. For the most part, fire regimes in this Fire Condition Class are within historical ranges. Vegetation composition and structure are intact. Thus, the risk of losing key ecosystem components from the occurrence of fire remains relatively low.

Condition Class 2. Fire regimes on these lands have been moderately altered from their historical range by either increased or decreased fire frequency. A moderate risk of losing key ecosystem components has been identified on these lands.

Condition Class 3. Fire regimes on these lands have been significantly altered from their historical return interval. The risk of losing key ecosystem components from fire is high. Fire frequencies have departed from historical ranges by multiple return intervals. Vegetation composition, structure and diversity have been significantly altered. Consequently, these lands verge on the greatest risk of ecological collapse

Fire Management Planning: A generic term referring to all levels and categories of fire management planning, including: preparedness, prevention, hazardous risk assessment, and mitigation planning.

Fire-prone Ecosystem - Ecosystems that historically burned intensely at low frequencies (stand replacing fires), those that burned with low intensity at a high frequency (understory fires), and those that burned very infrequently historically, but are now subject to much more frequent fires because of changed conditions. These include fire-influenced and fire-adapted ecosystems.

Ecosystem – A spatially explicit, relatively homogeneous unit of the Earth that includes all interacting organisms and components of any part of the natural environment within its boundaries. An ecosystem can be of any size, e.g., a log, pond, field, forest, or the Earth's biosphere.

Ecosystem Integrity – The completeness of an ecosystem that at geographic and temporal scales maintains its characteristic diversity of biological and physical components, composition, structure, and function.

Resiliency – The capacity of an ecosystem to maintain or regain normal function and development following disturbance.

Fire-prone ecosystem – Ecosystems that historically burned intensely at low frequencies (stand replacing fires), those that burned with low intensity at a high frequency (understory fires), and those that burned very infrequently historically, but are now subject to much more frequent fires because of changed conditions. These include fire-influenced and fire adapted ecosystems.

Severe wildland fire (catastrophic wildfire) – Fire that burns more intensely than the natural or historical range of variability, thereby fundamentally changing the ecosystem, destroying communities and/or rare or threatened species/habitat, or causing unacceptable erosion (see 1999 GAO report).

Wildland urban interface – The line, area, or zone where structures and other human development meet or intermingle with undeveloped wildland or vegetative fuels.

APPENDIX 6
Public Meeting Comments

Wednesday, Nov. 19, 2004
BLM Redding Field office

BLM staff recorded the following comments on flip charts. They are organized by category, not in the order received.

Comments

Shooting

- There is an objection to phasing out the shooting area.
- The facilitator incorrectly said there are three planning alternatives. There are actually four alternatives, including the no action alternative. The no action alternative might be the best.
- The shooting area should be retained until there is an alternate site available.
- There is an objection to the two-year phase out without an alternate shooting area being identified.
- The current shooting area is not within the Area of Critical Environmental Concern. The current location is a "natural" shooting area.
- BLM is ignoring the needs of the shooting public.
- There is a difference between a formal shooting range and casual shooting. Swasey is one of the few areas left where shooting can be concentrated.
- There are doubts about the accuracy of the complaints regarding shooting safety.
- BLM needs to include quantitative estimates about the likely visitor use under each alternative.
- BLM should revisit any proposals involving gates at the area.
- A fee or member only shooting area is not a viable alternative to the Swasey Drive shooting area.
- Supports Alternative One: close the designated shooting area.
- BLM closed the Clear Creek shooting area without having an alternate area in place. BLM continues to close shooting areas without providing alternate shooting areas.

- Shooting ranges are continually being shut down in favor of other recreation uses such as hiking trails.
- The Swasey Drive existing target shooting area phase out should be over five years, not two.
- The shooting area on Iron Mountain Road is becoming unsafe.
- The draft activity plan is slanted toward shooting range closure.
- Education is needed about littering, direction of fire and shooting safety. BLM should spend effort on education instead of just issuing citations.
- BLM should designate shooting lanes using arrows, painted rocks, etc. Signs should be posted advising shooters to pick up spent cartridges.
- BLM documentation of safety incidents is poor.
- BLM policy about shooting should not be based on perceptions (about shooting dangers).
- If you hear a gunshot, you are safe.
- The Sheriff's Office has documentation about safety incidents.
- Hunting cartridges (brass) are litter, too. (Discussion was comparing hunting litter to shooting range litter).
- The activity plan should contain binding language requiring BLM to provide an alternate shooting area before closing the Swasey Drive shooting range.

Heritage Resources

- Allowing primitive camping seems inconsistent with protecting cultural (heritage) resources
- Allowing primitive camping will be inconsistent with night closures.
- Allowing primitive camping is not consistent with allowing hunting.
- Material in cultural resources sites was discarded by the Indians. "Trash" should not be saved.

Law Enforcement

- BLM should provide more details on law enforcement violations.

General Comments

- BLM's agenda is to lock people out of the area.
- A larger parking area is needed.
- The first subdivision went into the area 15 years after establishment of the gun range.
- BLM should revisit the letter from the Straight Arrow Bow Club that addressed buffer zones, disposal and fencing issues.
- BLM's proposed plan should include a list of resource management priorities with weighting factors.

Questions

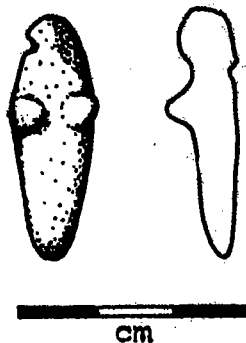
The following questions were posed to members of the BLM planning team. Staff responses **at the time** are briefly summarized in italicized text.

- Why did BLM issue a letter to the Straight Arrow Bow Club saying that lands in the planning area will be disposed of?
>> Field Manager Chuck Schultz proposed a meeting with the bow club to clarify the letter and its intent. Such a meeting apparently did not occur prior to his retirement. This proposal is addressed elsewhere in this document.
- Which alternative allows the most public access?
>> Alternative two
- Why develop the shooting area if the plan is to phase it out?
>> During the interim years some improvements could be made to help address some shooting safety issues. (Some have been implemented in 2004.)
- Has the BLM approached the in holder (Section 6) about public acquisition?
>> The landowner was informally contacted in the field.
- What are the plans for legal OHV use?
>> Each plan alternative contains provisions for off highway motorized vehicles. Any use will be on designated routes only.
- Were any shooting range or ballistic specialists –on staff or others – consulted in development of the draft plan?
>> One employee formerly managed a military range and had input into this plan.
- Can alternative trails be developed around shooting areas?
>> Yes. One trail around the shooting area is currently under construction.
- Will horseback use create the same trail impacts as OHV use?
>> No. Spinning tires generally have more impact on trail surfaces than hooves. Trails are usually designed with specific types of uses in mind.

- Are the ranges on Iron Mountain Road a good alternative?
 >> *Shooting is allowed at sites on Iron Mountain Road. BLM often directs target shooters there, but it is not a designated shooting range.*
- Are there documented cases of shooting range dangers (stray bullets)?
 >> *Field manger Chuck Shultz personally knows of four incidents, including retrieval of a bullet from a window sill on a home, and retrieval of bullet from a swimming pool. Chuck explained that as a federal manager he is obligated, under the Federal Tort Claims Act, to take action to protect public health and safety when he is aware of potential health and safety threats.*
- How can private in holders maintain access to their property?
 >> *They must obtain from BLM a right of way across public land.*
- Is the rifle range on Walker Mine Road a done deal, and are there other shooting alternatives?
 >> *The BLM is in the process of amending Redding Resource Management Plan to identify the Walker Mine Road land as suitable for disposal from public ownership and sale to the Redding Gun Club. If that sale is completed, development of the shooting range will fall under the jurisdiction of Shasta County and state environmental reporting requirements (the California Environmental Quality Act). [The present Field Office Manager has subsequently-2004-denied the proposal—see other responses.]*
- Why are target shooting shells considered litter and hunting shells are not?
 >> *In target shooting areas there is a much heavier concentration of spent cartridges. Hunters and target shooters should pick up their spent cartridges or shells.*
- How many law enforcement rangers are assigned to the Redding office and how much area do they cover?
 >> *Two rangers cover public lands in five counties. They are responsible for more than 250,000 acres.*
- Elaborate on soil contaminants. Does BLM formally track the type of recreation visitors using the Swasey Drive area?
 >> *Lead associated with gun ranges is a recognized hazardous waste contaminant, and there are reporting and clean up requirements. Elevated lead levels (but not over state thresholds) in water have been confirmed in water runoff sediments immediately below the shooting site, but not further downstream, in one sediment sample. BLM tracks visitor numbers, but does not formally track the types of recreation uses. Law enforcement observation is that shooters are the predominant users of the area.*
- Was the arrastra site checked for mercury?
 >> *No. We do know that mercury was historically used in gold processing.*
- Will BLM reconsider the lot line adjustment proposed by the Straight Arrow Bow Club?
 >> *The BLM will revisit the issue. [See other comments for update.]*
- What are the current problems at the shooting range?
 >> *BLM has concerns about safety, littering of shells and target materials. Problems are caused by a minority of shooters, but BLM must address them.*
- Do the various alternatives have different effects on visitor use?

>> Yes. There can be different numbers of visitors and types of use depending on the theme of a management alternative.

- Is the Walker Mine road proposal tied to the closing of the Swasey shooting site?
>> There are two separate processes underway: development of the management plan for the Swasey site, and a land use plan amendment to offer the Walker Mine Road land for sale to the Redding Gun Club. It is hoped that the Walker Mine range could be open when the Swasey site is closed, but there are no formal ties between the two land use planning processes. [See other comments for update.]
- Why allow hunting and primitive camping if phasing out shooting?
>> Shooting associated with hunting does not present the dangers associated with the concentrated, high level of gunfire associated with a gun range. Primitive camping is consistent with the undeveloped recreation experiences offered in the Swasey Drive area.
- How will overflow parking be handled?
>> Parking issues can be addressed if they arise, under any planning alternative.
- What is the rationale for closing the area? What if someone is locked in? Who will open and close gates?
>> Night closures will be announced through signing and enforced by law enforcement. If a decision is made to gate the area, procedures will be developed for closing and opening gates for sweeping the area prior to gate closures. BLM will be discussing gate issues, but the preferred alternative calls for posting night closures, not gating the area.
- How, in the two year term (shooting range phase-out) can the BLM provide public safety from shooting hazards?
>> Some improvement can be (and has been) made to the shooting area, especially in terms of allowable shooting locations at the site. More signing and information about shooting safety can be developed. [See final proposed action alternative.]



Clay figurine from the Tanya Site

TABLE 1
COST ESTIMATES AND PROJECT IMPLEMENTATION PHASING

ACTION	EXIST.	ALT. 2	ALT 3	PROPOSED ALT. 1	PHASING	COSTS
(1) Barricade/fence non-designated roads and vehicular ingress points	+	+	+	+	FY 2005*	\$2000.00 1 WM**
(2) Maintain designated roads and trails on at least a yearly basis	+	+	+	+	On-going	0.5 WM/year
(3) Archaeological site monitoring	+	+	+	+	On-going	Volunteers, law enforcement, archaeologist
(4) Monitor and upkeep of fence and gates at Here- Be-Bees archaeological site and access points.	+	+	+	+	On-going	Negligible
(5) Monitor and maintain other protective fencing (Middle Mule, Tanya, new fences) construct walking access gate to Tanya Site for public interpretation with signing	+	+	+	+	On-going Tanya Site interpretation FY 2005/2006	Several days per annum \$750.00
(6) Solicit archaeological research within ACEC	+	+	+	+	On-going	Grant requests, assistant agreements, etc. \$15,000- \$150,00
(7) Continue archaeological inventory and documentation	+	+	+	+	On-going	2.0 WMs total
(8) Provide interpretive signing, select vegetation removal and cleanup at Boswell Mine,	+	+	+	+	FY 2005-2007	CDF inmate crews, volunteers, 0.5 WM, \$4000.00

Tanya Site and
Clear Creek Ditch

(9) Restore by hand short select segments of the Clear Creek Ditch. Provide handicapped access along short stretch of ditch off of main dirt road	-	-	+	+	FY2005-2007	Volunteers \$500.00
(10) Law enforcement patrol: At least once weekly	+	+	+	+	On-going	Internal
(11) Law enforcement patrol: More than once weekly, develop area law enforcement plan	-	-	+	+	On-going, Plan by FY 2006	1 WM
(12) Install culvert on main dirt road at Olney Creek and secondary stream by private parcel	+	+	+	-	FY 2005/2006	\$500.00
(13) Develop brochure concerning area resources, safety, trails, etc. Summarize information on BLM web site	+	+	+	+	FY 2005/2006	\$1000.00
(14) Solicit public involvement in ecology management and educational field trips through announcements, visitor contacts and web site	+	+	+	+	FY 2005+	Internal
(15) Entryway kiosk eventual replacement; entryway sign design and placement; highway directional signs	-	+	+	+	FY 2007 for kiosk replacement; FY 2005/2006 for entryway/Swasey Drive signs' placement	0.5 WM \$2500.00
(16) Improve Swasey section of Interagency Wildfire	+	+	+	+	FY 2005	0.5 WM,

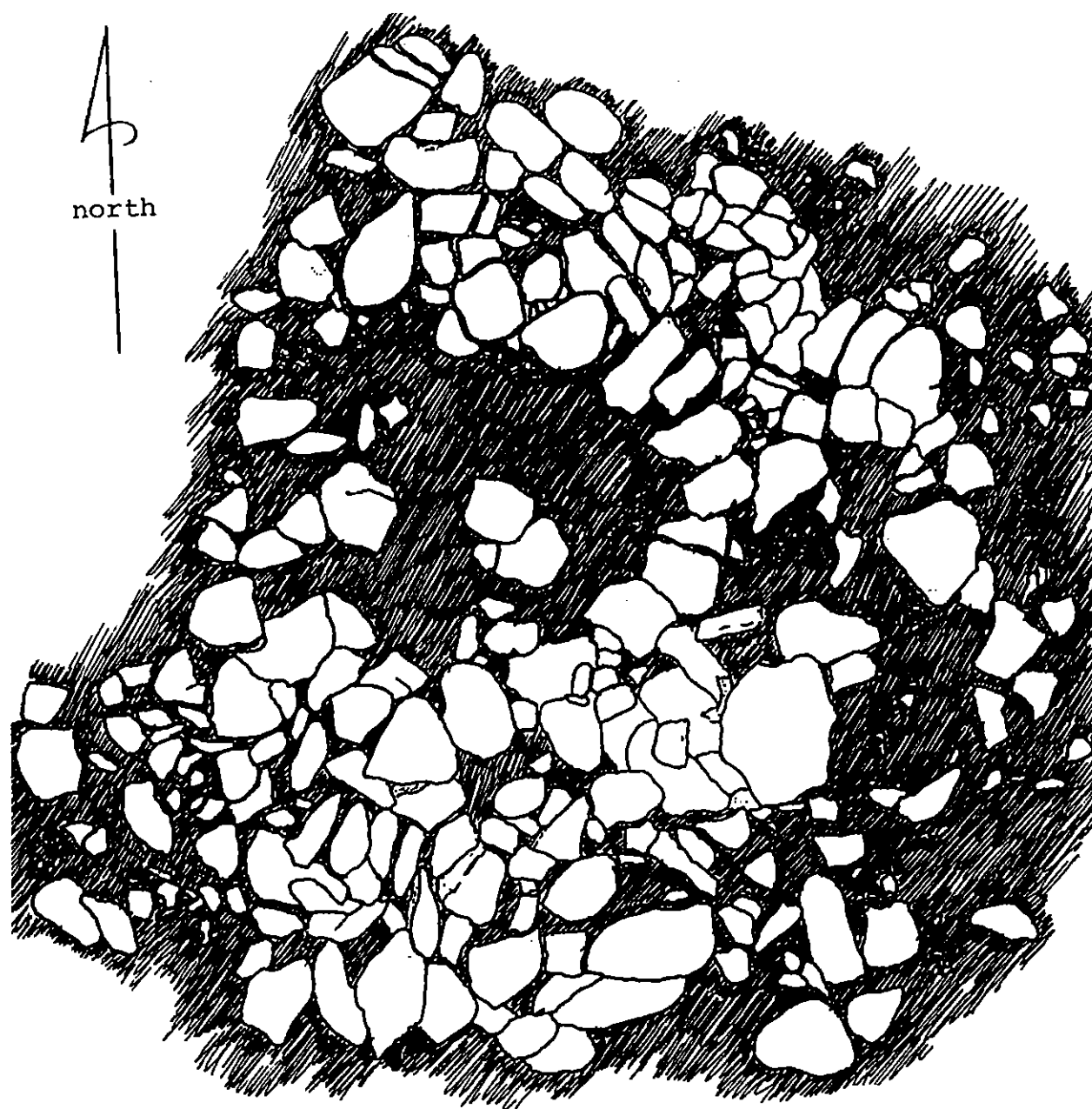
Suppression Field
Operation Guide

(17) Complete a shaded fuel break through non-mechanized methods along main east-west road and trail to link with current fuel breaks. Selectively construct other shaded fuel breaks by hand using burn piles and/or chippers by existing road access.	+	+	+	+	FY 2004 and thereafter	0.5 WM/year, \$35,000 Assistance agreement with local RCD or equivalent for initial fuelbreak; \$15,000-\$25,000 per fuelbreak thereafter
(18) Maintain new and existing fuel breaks by hand work, goats, herbicide, and limited fire means	+	+	+	+	FY 2007 and thereafter every 4-10 years	0.5 WM/year \$10,000/mile
(19) Conduct low to moderate heat intensity controlled ground fires at select units throughout planning area	+	+	+	+	FY 2006 and thereafter	1 WM/year Interagency \$200/acre, 5-200 acre blocks
(20) Cleanup of trash and deadfall on roads, trails and facilities	+	+	+	+	On-going	Internal
(21) Acquisition of private in-holding-willing seller. If acquired manage consistent with rest of area (plan amendment necessary)	-	+	+	+	On-going	2WMs purchase price
(22) Confinement of permitted bee hives to two non-sensitive locations	+	+	+	+	On-going	Internal
(23) Cooperative development of shooting area	-	+	+	-	FY 2005-2006	1 WM \$5000 (tables, toilet, garbage cans, signs, etc.)

(24) Limited mechanical development of shooting area	+	-	-	+ (phased out)	FY 2005-2006	0.5 WM
(25) Rehabilitation of shooting area, conversion to general recreation area after 4 years	-	-	-	+	FY 2005-2010	Volunteer assistance, 2 WMs, \$5000- \$50,000 ???
(26) Erosion control and rehabilitation of area opposite bow range and select road/trail scars	+	+	+	+	FY 2005-2006 and as needed	1 WM \$3000.00
(27) Rehabilitate modern mining trenches	+	+	+	+	FY 2006	0.5 WM
(28) Develop primitive camping area opposite bow range (road barriers, campfire rings, signs, etc.)	-	+	+	-	FY 2006	1 WM \$ 500.00
(29) Establish and sign public boundary on east and south sides and around private in- holding	+	+	+	+	FY 2006-2009	2 WM \$1000.00
(30) Integrate recreation uses within Swasey planning area with area west of Mule Mountain and Whiskeytown	+	+	+	+	On-going	Negligible
(31) Administratively close area to nighttime motorized vehicle use	-	-	+ (24 hours)	+	FY 2004	Negligible

* Fiscal Year (runs Oct. 1 to Oct. 1)

** WM = work months



Chinese Oven/Hearth, Swasey

